



Mehlvilleville School District

Individually Focused. Committed to All.

Curriculum Handbook

Seventh Grade

2022 - 2023



Dear Parents, Guardians, Students and Families of the Mehlville School District:

The Curriculum Department is pleased to present you with the Mehlville School District Seventh Grade Curriculum Handbook. This handbook has been developed to help you understand what children should know and be able to do by the end of each grade level in each subject area.

This handbook is revised annually and includes Board-approved curriculum revisions to help meet the identified educational objectives for your child's grade level. Our teachers, principals and directors have provided suggestions for families to enhance and assist with your child's learning. We hope this handbook is helpful to you in having meaningful discussions with your child and your child's teacher about the curriculum being taught in their classroom.

Mehlville teachers and administrators work diligently to provide the best education possible for your children. We appreciate your support and the opportunity to serve in such a wonderful community. If you have any questions or comments regarding curriculum, feel free to contact your teacher, principal, curriculum directors (listed in the Acknowledgements section at the back of this book), or me. We welcome your thoughts and appreciate hearing from you.

The Mehlville School District provides educational opportunities for students and families from birth through adulthood. We are very proud to serve thousands of families beginning with our Parents as Teachers Program (PAT), Early Childhood Program, K-12 Programs, and our Community Education Program. It is our hope these important programs enhance the quality of life for all district patrons.

To access the handbook online, please go to www.mehlvilleschooldistrict.com, click on Curriculum, then Handbooks. We are happy to provide hard copies for families that prefer them over online access. Please take a few moments to look at the handbook and feel free to let us know your thoughts regarding the prepared documents.

The Mehlville Board of Education, Central Office Team, Principals, Curriculum Directors, Teachers and Support Personnel all wish you and your child a successful school year.

Sincerely,
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Core Curriculum Class Offerings

English Language Arts

7th Grade English Language Arts (M0700)

The student in 7th Grade Language Arts will develop writing, speaking, and reading skills. The student will write on a regular basis, with an emphasis on fluency and analysis, and will develop strong academic practices and strategies, such as collegial discussion and evaluating text. The student will develop comprehension and reading strategies with both literary and non-fiction texts. The student will respond to literature and other texts in class discussion, peer groups, and through writing as well as informal and formal presentations.

Course Objectives

- The student will write informally on a weekly basis, analyzing and responding to texts, and incorporating evidence from texts.
- The student will master paragraph writing skills, focusing on format and incorporating evidence, with at least three developed pieces per grading term.
- The student will write a minimum of two polished, multi-paragraph essays over the course of the year, following a writing process that includes revision and editing for standard English usage; genres will include exposition and argumentation.
- The student will follow a style guide to format essays and projects and to cite sources while avoiding plagiarism.
- The student will participate in informal discussions, presentations, peer feedback, or collaborative groups on a daily basis.
- The student will complete at least one polished research project, incorporating a minimum of three credible sources and will engage monthly in informal research.
- The student will read, discuss, analyze, and apply literary devices to a minimum of three longer volumes of work, including at least one novel and at least one non-fiction piece at an appropriate level of text complexity.
- The student will read extensively in a variety of genres, including short fiction, short nonfiction and informational text, and poetry, averaging a minimum of 50 pages of reading per week at an appropriate level of text complexity.
- The student will write informally on a weekly basis, analyzing and responding to texts, and incorporating evidence from texts.
- The student will participate in informal discussions, presentations, peer feedback, or collaborative groups on a daily basis.
- The student will plan and present formally a minimum of one time over the course of the year with an emphasis on developing presentation skills (such as eye contact, tone, volume, pace, articulation, and pronunciation); the presentation may be collaborative or multi-media.

Creative Writing (elective option) (M0101)

The creative writing student will write original narrative pieces and poetry through the writer's workshop. The student will explore a variety of techniques including the use of figurative language, generating writing ideas, and finding artistic inspiration. The student will share their work with peers and with outside audiences, including submitting works for publication.

Course Objectives

- The student will write daily and will engage in the Writer's Workshop with an expectation of producing a minimum of 3 polished pieces during the semester to be shared with peers and outside audiences.
- The student will apply pre-reading, during reading and post reading strategies for comprehension and interpretation by analyzing mentor texts.
- The student will utilize the writing process to organize, revise, and produce original works in narratives and poetry while meeting deadlines.
- The student will organize, revise, and edit their writing for both Standard English grammar and creative effect.
- The student will listen effectively as demonstrated through a variety of oral and written responses, note taking, and classroom discussion.
- The student will showcase fresh ideas and pay careful attention to meaningful word choice.
- The student will develop a voice in their writing, an understanding of personal style, and pay careful attention to the audience and purpose.

Parents/Families may assist their children by:

- Checking their student planner
- Reviewing completed homework
- Reading and discussing what was read
- Calling the homework hotline
- Encouraging their child to always have a book with them to read

Publications (year-long elective) (M0301)

In this course, the student produces the middle school yearbook, school newsletter, and school videos. Each student learns publication skills, including copy writing and reporting, marketing, layout and design, photography, script writing, presentation skills, and editing. The student learns to accept responsibility for deadlines and collaborating with peers.

Course Objectives

- The student will successfully master and apply basic design skills.
- The student will create computer layouts that follow basic design principles.
- The student will demonstrate time management and organizational techniques.
- The student will demonstrate basic production skills and concepts.
- The student will master and apply successful interviewing and reporting techniques.
- The student will write copy across multiple platforms.
- The student will develop formal and informal oral presentation skills.
- The student will develop and apply knowledge of marketing strategies.

Health

7th Grade Health (M8672)

Seventh Grade Health students will practice effective decision making, analyze cause and effect, and develop core health content knowledge. Students will focus on social and emotional health, as well as developing a deeper understanding of nutrition, the risks of nicotine products, and peer pressure. Students will discuss suicide prevention, the effects of personal decisions on their body systems, addiction, and media literacy. They will participate in guided research on various health related topics.

Course Objectives

- The student will apply effective decision making skills in the areas of nicotine products, peer pressure, and social health.
- The student will analyze how their decisions can impact peers and the community.
- The student will analyze cause and effect relationships in health decisions, including nutrition, addiction, media literacy, and suicide prevention.
- The student will develop and apply skills to prevent the negative effects of high risk behaviors.
- The student will identify the components of the cardiovascular, respiratory, and nervous systems and will analyze how personal choices can impact those systems.
- The students will develop personal health planning strategies in the areas of nutrition and nicotine products.
- The student will analyze the validity of resources and conduct guided research into personal and community health issues.

Parents/Families may assist their children by:

- discussing strategies to avoid acceptance of tobacco, alcohol and other drugs
- discussing health issues related to adolescence
- modeling a healthy lifestyle
- talking to them about healthy eating
- encouraging good personal hygiene habits

Mathematics

Math 7 (M2700)

This course is a developmental approach to Algebra showing students how algebraic concepts relate to other content areas and everyday experiences. Students will engage in mathematical activities to learn number operations, proportional reasoning, geometry, probability and data analysis, with a focus on developing algebraic thinking.

Assessment of students in mathematics includes, but is not limited to, mathematics journals, end-of-unit exams, performance tasks, quizzes, STAR Math, and Missouri Assessment Program (MAP) testing.

Course Objectives

- The student will apply understandings of proportional relationships to equations and real-world problems.
- The student will apply understandings of rational numbers to real-world problems.
- The student will use properties of operations to simplify algebraic expressions and solve equations.
- The student will develop the knowledge and skill to use geometry in real-world situations.
- The student will develop the skills necessary to compare data.
- The student will develop the knowledge and skills necessary to solve problems on their own.

Math 7 Advanced (M2710)

This course is designed to challenge the student while developing algebraic concepts and relating them to other content areas and everyday experiences. The student will be engaged in mathematical activities to learn number operations, proportional reasoning, geometry and probability and statistics, with a focus on developing algebraic thinking in clear algebraic language.

Assessment of students in mathematics includes, but is not limited to, mathematics journals, end-of-unit exams, performance tasks, quizzes, STAR Math testing and Missouri Assessment Program (MAP) testing.

Course Objectives:

- The student will develop knowledge and skills necessary for working with numbers fluently.
- The student will develop an understanding of number operations necessary to apply linear equations and systems of linear equations to real-world situations.
- The student will develop the knowledge and skill necessary to create linear functions.
- The student will develop the knowledge and skill to use geometry in real-world situations.
- The student will develop skills necessary to compare data.
- The student will develop the knowledge and skills necessary to solve problems on their own.

Parents/Families may assist their children by:

- pointing out uses of negative numbers in everyday occurrences
- reviewing homework
- attending parent tutor nights at school
- providing a quiet study time for homework
- calling the homework hotline to check assignments
- showing how to solve everyday math problems

Physical Education

7th Grade Physical Education (M8572)

Students in 7th Grade Physical Education will continue to develop the basic skills introduced in 6th Grade P.E. through active engagement in physical fitness. Students will participate in teams emphasizing collaboration and communication.

Course Objectives

- The student will regularly participate in vigorous physical activity inside and outside of class.
- The student will demonstrate cooperation skills by establishing rules and guidelines for resolving conflicts.
- The student will identify and demonstrate social and safety skills with respect to self and others.
- The student will define physiological principles of physical fitness.
- The student will actively participate in lifetime and team sports.
- The student will participate in lead up games and activities in order to develop rule comprehension, strategies and proper etiquette.
- The student will demonstrate command of rhythm through participating in rhythmic physical activities.
- The student will actively participate in the FitnessGram Test twice a year.

Parents/Families may assist their children by:

- encouraging participation in sports
- talking about good sportsmanship
- exercising with them
- modeling and encouraging fair play

Lifetime Fitness (Elective Option in Physical Education) (M8501)

Fitness consists of a variety of aspects: muscular strength, muscular endurance, cardiovascular condition/endurance, and flexibility. This course is designed to instruct individual students about exercise activities to improve strength, endurance, and flexibility and to assist the student in developing personal and lifelong fitness goals.

Course Objectives

- The student will participate in a variety of sport and lifetime/recreational activities to understand the importance of being physically fit.
- The student will identify and apply principles of training and conditioning for physical activity.
- The student will set personal fitness goals and will create a personal fitness plan based on research.
- The student will research, create, and lead small group physical activities, such as class warm-ups, dances, and games.
- The student will describe and practice ethical personal and group conduct appropriate for engaging in games, sports, and life, such as kindness, sportsmanship, and positive collaboration.

Parents/Families may assist their children by:

- encouraging them to participate in sports
- exercising with them
- making sure they “dress out” for gym
- talking to them about sportsmanship and fair play

Science

Science 7 - Earth Science (M3700)

The Earth Science course develops understanding of a wide range of topics that build from elementary school into more advanced content. There are six topics addressed and they are space systems, history of Earth, Earth's interior systems, Earth's surface systems, weather and climate, and human impacts. There is a great emphasis on systems and societally relevant concepts such as resources, hazards, and environmental impacts in this course.

Assessment includes, but is not limited to, observation checklists, end-of-unit exams, performance tasks, quizzes, laboratory reports, science notebooks, and concept maps.

Course Objectives

- The student will demonstrate proficiency in developing and using models.
- The student will demonstrate proficiency in analyzing and interpreting data.
- The student will demonstrate proficiency in constructing explanations.
- The student will also see the parallels between Earth science concepts and engineering and technology.
- The student will formulate answers to the following questions:
 - "What is Earth's place in the Universe? What makes up our solar system and how can the motion of Earth explain seasons and eclipses?"
 - "How do people determine that the Earth and life on Earth have changed over time? How does the movement of tectonic plates impact the surface of Earth?"
 - "How do the materials in and on the Earth's crust change over time? How does water influence weather, circulate in the oceans, and shape Earth's surface?"
 - "What factors interact and influence weather and climate?"
 - "How can natural hazards be predicted? How do human activities affect Earth systems?"

Parents/Families may assist their children by:

- visiting museums, aquariums, the Zoo, Missouri Botanical Gardens, the Science Center, the Magic House, Planetarium, going camping, participating in citizen science events, etc.
- creating a quiet study environment at home
- making sure they have all the necessary supplies
- reviewing completed homework and assignments
- checking the homework hotline on the school's web page

Social Studies

World Civilizations 7th Grade (M1700)

The World Civilizations curriculum will concentrate on the history of various civilizations. The study of these civilizations will be covered through the examination of the history, government, geography, economics, and social/cultural aspects of each area. Tools of inquiry (e.g. surveys, statistics, maps and documents), research skills and methods will be emphasized. Connections to the present world and relationships to current events will be discussed and explored.

Assessment methods include quizzes and tests using selected response, constructed response or performance event questioning. Most assessment is monitored using specific scoring guides.

Course Objectives

- Compare and contrast various cultures and civilizations throughout the world, exploring the themes of continuity.
- Identify and define the principles which shaped democracy.
- Identify and define the principles and processes of governance systems.
- Interpret and apply economic concepts and principles.
- Utilize geographic research tools to analyze geography and its relationship to changes in society and the environment.
- Describe and analyze the relationship of the individual and groups to cultural traditions and institutions.
- Utilize the tools of social science inquiry to select and investigate topics in world history.
- Read, evaluate, and analyze primary and secondary text resources
- Develop written claims about topics in world history and support them with research and text resources.

Parents/Families may assist their children by:

- establishing regular routines for completion of assignments and projects
- providing opportunities to learn about current events through the newspaper, travel and the news
- encouraging them to read and research about historically related topics
- modeling good citizen behavior

Technology Literacy

Business and Information Technologies - 7th Grade Technology Literacy (M8771)

In this project-based course, the student will master technology and internet skills to prepare them for high school and beyond. Using Microsoft Office, Google Suite, and other digital tools, the student will explore word processing, spreadsheet, and presentation softwares, along with digital design concepts for academic and business uses.

Course Objectives:

- The student will develop the skills needed to use software applications effectively.
- The student will explore real-world examples of the legal and ethical issues of internet and social media use, and the sharing of personal information.
- The student will develop effective written and visual digital communication skills.
- The student will use online research skills to find and evaluate resources.

Parents/Families may assist their children by:

- providing them with computer equipment
- having them practice keyboarding skills
- monitoring their Internet use
- stressing the importance of technology in our society
- supporting technology literacy programs in the school

Elective Course Offerings

Family and Consumer Sciences

Introduction to Family and Consumer Sciences (M4701)

This course promotes knowledge of child development, consumer skills, foods and nutrition, and the production of clothing and textiles through hands-on projects and real world applications. The student will complete a beginning level sewing project, develop food safety and nutrition skills, as well familiarity with basic child development.

Assessment for family and consumer science includes, but is not limited to, teacher-made tests, in-class recitations, assignments, projects, and presentations.

Course Objectives

- The student will describe the various aspects of developmental growth in children.
- The student will describe the roles and responsibilities when caring for children, especially safety issues.
- The student will examine and apply recommended guidelines for food safety, sanitation, and nutrition.
- The student will develop and practice basic food preparation methods.
- The student will investigate appropriate clothing care and repair.
- The student will practice basic sewing techniques and use basic sewing equipment safely.
- The student will explore career opportunities related to Family and Consumer Science.

Advanced Family and Consumer Sciences (M4703)

This course builds on the skills and knowledge developed in the Introduction to FACS class. The student develops Family and Consumer Science knowledge through the application of intermediate level sewing projects and food labs. In addition to these practical living skills, the investigation of family dynamics and parenting roles will help prepare the student for future personal and professional experiences. (Prerequisites: Introduction to FACS or teacher approval) Assessment for family and consumer science includes, but is not limited to, teacher-made tests, in-class recitations, assignments, projects, and presentations.

Course Objectives

- The student will demonstrate meal planning principles and techniques based on standardized recipes to meet individual needs
- The student will demonstrate intermediate level food preparation methods and techniques for a variety of food categories
- The student will develop food safety and sanitation practices
- The student will examine and analyze how various elements, including family diversity, economics, birth order, education level, etc. influence family structure and dynamics.
- The student will identify the risks associated with adolescent parenthood
- The student will examine factors influencing family decisions
- The student will demonstrate basic skills of production, alteration, repair, and recycling of textiles, fashion, and apparel.

Food Careers (M4702)

In this hands-on semester course, the student will be introduced into the world of professional cooking including training in safety and sanitation. The student will also analyze career paths within the food production and food service industries. The student will have the opportunity to develop their own food-based business model. (Prerequisites: Introduction to FACS or teacher approval)

Assessment for family and consumer science includes, but is not limited to, teacher-made tests, in-class recitations, assignments, projects, and presentations.

Course Objectives

- The student will identify interests, aptitudes and skills necessary when exploring future careers through the completion of assigned activities, review techniques and career projects.
- The student will apply safe and sanitary food handling procedures.
- The student will demonstrate professionalism in class projects and food production.
- The student will perform basic math calculations for measuring, cost control and yields.
- The student will read about and demonstrate cooking methods and their application and impact on nutrition.
- The student will demonstrate the correlation of customer service and success in business.

Parents/Families may assist their children by:

- allowing them to contribute in the home and kitchen
- encouraging them to grow in their ability to follow technical directions
- encouraging hands-on creativity
- reviewing their portfolio periodically
- checking their planner and calling the homework hotline

Performing Arts

Introduction to Music (M7750)

Introduction to Music is a semester elective open to any middle school student, who is interested in making music. This course is appropriate for all levels of musicianship and explores vocal and instrumental music.

Music classroom-based assessment is curriculum-centered and standards-based. It focuses on content, process and participation at the middle school level. Music assessment includes teacher observations, anecdotal records and teacher-made quizzes.

Course Objectives

- The student will be able to sing using appropriate vocal techniques.
- The student will be able to read standard notation.
- The student will be able to perform melodies on an instrument.
- The student will be able to perform a chordal and/or rhythmic accompaniment.
- The student will be able to create and perform a melody on an instrument.
- The student will be able to analyze and describe musical examples from various historical periods.

Middle School Beginning Band (M7660)

Beginning Band is for the student in sixth through eighth grade who wishes to learn to play a traditional band instrument (flute, oboe, clarinet, saxophone, bassoon, trumpet, horn, trombone, baritone/euphonium, tuba, and concert percussion). No previous experience is necessary. This class addresses the gradual development of technical skills and good care of the band instrument, which eventually leads to the performance of simple band literature.

Course Objectives

- The student will demonstrate basic technical skills of performance alone and in a group using teacher selected band literature.
- The student will perform with a characteristic tone on their instrument.
- The student will demonstrate basic care, maintenance, handling, and hygiene of the instrument.
- The student will count, perform, notate and improvise basic rhythmic patterns.
- The student will read standard notations and interpret basic symbols and vocabulary that conveys precise musical meanings.
- The student will accept feedback from peers and instructors on how to improve on skills.

Middle School Beginning Choir (M7761)

Middle School Beginning Choir is a performing ensemble for the student who wants an aesthetic choral experience that involves the study of a wide variety of choral literature from various historical periods. The student studies vocal technique, music literacy, and performance skills. Through observing and listening to others, the student will develop their analysis and critical thinking skills. This choir participates in a variety of performances in the community.

Music classroom-based assessment is curriculum-centered and standards-based. It focuses on content, process and participation at the middle school level. Music assessment includes teacher observations, anecdotal records and teacher-made quizzes.

Course Objectives

- Develop and apply singing skills to perform and communicate through the arts.
- Develop and apply the knowledge and skills to read and notate music.
- Develop and apply the knowledge and skills to analyze and describe music and musical performance.

Middle School Concert Choir (M7791M)

Middle School Concert Choir is a performing ensemble for the student who desires an aesthetic choral experience that involves the study of a wide variety of advanced choral literature from various historical periods. The student studies advanced vocal technique, music literacy, and performance skills. Through observing and listening to others, the student will develop their critical thinking skills. This choir participates in concerts, choral festivals, competitions, and performances in the community.

Music classroom-based assessment is curriculum-centered and standards-referenced. It focuses on content, process and participation at the middle school level. Music assessment includes teacher observations, anecdotal records and teacher-made quizzes.

Course Objectives

- Develop and apply singing skills to perform and communicate through the arts.
- Develop and apply the knowledge and skills to read and notate music.
- Develop and apply the knowledge and skills to analyze and describe music and musical performance.
- Develop and apply the knowledge and skills to understand the relationships between music, the other arts and disciplines outside the arts.
- Develop and apply the knowledge and skills to understand works of art in the context of time and place.

Middle School Intermediate Band (M7670)

Middle School Intermediate Band is for the middle school student who wishes to continue to learn to play their instrument. This class addresses the development of technical skills and good care of the band instrument, which eventually leads to the performance of band literature in an ensemble setting.

Course Objectives

- The student will demonstrate intermediate technical skills of performance alone and in a group using teacher selected band literature.
- The student will perform with a characteristic tone on their instrument.
- The student will demonstrate common care, maintenance, handling, and hygiene of the instrument.
- The student will count, perform, notate and improvise intermediate rhythmic patterns.
- The student will read standard notations and interpret intermediate symbols and vocabulary that conveys precise musical meanings.
- The student will accept feedback from peers and instructors on how to improve on skills.

Middle School String Orchestra (M7640)

Middle School String Orchestra is a continuum. At one end is dependence and at the other independence. Middle School String Orchestra classes work to develop musicians who will be able to perform in a high school ensemble. This course will continue to emphasize learning to play with steady pulse, note reading from basic to more complex, rhythm reading from basic to more complex, bowing techniques, shifting, expressive musical terms, intonation, and learning to play in an ensemble. Emphasis will continue to reinforce the fundamentals of good posture and playing skills.

Course Objectives

- The student will demonstrate proper playing posture and position.
- The student will perform rhythms ranging from basic to more complex.
- The student will develop bowing technique to produce appropriate dynamics, expressive markings, and tone.
- The student will develop basic vibrato technique.
- The student will learn how to read basic to more complex music notation and expressive markings.
- The student will develop and discern intonation. Students will learn how to play with alternative fingerings (shifting).
- The student will demonstrate adequate skills of performing in an ensemble. demonstrate audience behavior appropriate for the context and style of music performed with 80% accuracy.

Middle School Theatre Arts (M7101)

The student in Theatre Arts will develop performance and presentation skills and will examine various aspects of modern and improvisational theatre. The student will view performances and have the opportunity to attend live performances. This class can be taken and repeated multiple times; it will be modified to meet student needs.

Course Objectives

- The student will practice aspects of performance on a daily basis.
- The student will collaborate with classmates to develop a public performance piece.
- The student will read scripts and view performances.
- The student will have opportunities to create performances and make connections to the principal components of theatre.
- The student will visit a performing arts venue.

Parents/Families may assist their children by:

- providing opportunities for them to see and hear live musical and theatre performances that are appropriate for their age.
- encouraging them to practice at home on a regular basis.
- providing a quiet place for them to practice at home.
- providing them with a quality musical instrument that is in good playing condition.
- encouraging their ongoing progress along with attending their concerts/performances.
- chaperoning music field trips.
- teaching the importance of respecting school property, their instrument and other student's instruments.
- discussing appropriate behavior at various musical and theatre events.

Project Lead the Way (PLTW)

App Creators (M5018M)

Students learn and apply computational thinking and technical knowledge and skills to create mobile applications. Students also acquire and apply skills pertaining to the design process, problem solving, persistence, collaboration, and communication.

Course Objectives

- The student will be introduced to pair programming, app development, and the MIT App Inventor development tool.
- The student will learn about the Model-View-Controller design pattern, app graphical design, event-driven programming, debugging, and algorithm creation using variables and conditional logic.
- The student will create apps and interactive games using interface features, media, and animation.
- The student will create algorithms using loops and create procedures to abstract the details of a task and reduce redundancy.
- The student will design and create a mobile app solution for a personal or community problem.

Automation and Robotics (M5002)

Students trace the history, development, and influence of automation and robotics as they learn about mechanical systems, energy transfer, machine automation, and computer control systems. Students use the VEX Robotics platform to design, build, and program real-world objects such as traffic lights, toll booths, and robotic arms.

Course Objectives

- define automation and robotics and describe their purposes
- research the history of automation and robotics and summarize their impact on society
- use equations to solve real-life problems
- understand and apply mechanics to solve real-world problems
- understand and design a variety of systems
- make predictions and problem solve potential malfunctions

Computer Science for Innovators and Makers (M5019M)

Students learn about programming for the physical world by blending hardware design and software development. Using micro-controllers with inputs and outputs, they develop code that brings their physical designs to life.

Course Objectives:

- The student will use block-based code to create, download, and upload programs to the micro:bit micro-controller.
- The student will learn processes and skills to debug programs.
- The student will create their own input device to interact with a program they will develop on a micro-controller.
- The student will work as a team to apply physical computing knowledge and skills to design and create one of three problem options.
- The student will collaborate and solve authentic problems using communication, math, and science skills.

Design and Modeling (M5004)

Students apply the design process to solve problems and understand the influence of creativity and innovation on their lives. They work in teams to design a playground and furniture, capturing research and ideas in their engineering notebooks. Using Autodesk design software, students create a virtual image of their designs and produce a portfolio to showcase their innovative solutions.

Course Objectives

- understand and apply the steps used in the design process
- apply engineering notebook standards and protocols when documenting work as assessed by student activities and engineering notebook
- take accurate measurements and make conversions
- utilize sketching and dimensioning techniques to create a variety of designs and to communicate ideas
- design and create CAD modeled parts and assemble a product using the CAD modeling program
- work cooperatively and effectively with a team

Green Architecture (M5001)

Today's student has grown up in an age of "green" choices. The student learns how to apply this concept to the fields of architecture and construction by exploring dimensioning, measuring, and architectural sustainability as they design affordable housing units using Autodesk's 3D architectural design software.

Course Objectives

- The student will investigate green architecture as assessed by class discussion, activities, and presentations.
- The student will use equations to solve real-life problems as assessed by tests, activities, projects, and presentations.
- The student will explain sustainable architecture as assessed by activities, projects, and presentations.
- The student will demonstrate knowledge of measurement, construction, and design as assessed by projects and presentations.

Medical Detectives (M5003)

The student plays the role of a real-life medical detective as they analyze genetic testing results to diagnose disease and study DNA evidence found at a "crime scene". They solve medical mysteries through hands-on projects and labs, investigate how to measure and interpret vital signs, and learn how the systems of the human body work together to maintain health.

Course Objectives

- The student will utilize the skills of a medical detective as assessed by class discussion, activities, and presentations.
- The student will evaluate real-life case files to diagnose illness as assessed by tests, activities, projects, and presentations.
- The student will explain the mysteries of the human body systems as assessed by activities, projects, and presentations.
- The student will determine a cause of death from a murder mystery using physical evidence, DNA, and autopsy reports as assessed by activities, projects, and presentations.

Parents/Families may assist their children by:

- encouraging them to review ideas and concepts discussed in class
- visiting sites such as code.org participating in coding events
- going to maker faires and innovative centers throughout St. Louis
- participating in STEM clubs and activities for families throughout the region
- tinkering at home
- encouraging a growth mindset
- asking questions and trying to find solutions

Technology and Engineering

Design Lab (M4802)

This course provides a general groundwork for best practices within the industrial design field. The student will develop techniques for brainstorming, design development, presentation and problem solving, as well as hands-on creation of student designs/prototypes. (Prerequisites: Woodworking and Metalworking or teacher approval) Assessment includes teacher-made tests, in-class assignments, projects and presentations.

Course Objectives

- The student will practice safety protocols in the technical classroom.
- The student will reinforce specific knowledge including measurement, reading and developing plans, and tool use from woodworking and metalworking through practice and reflection in an action-oriented setting.
- The student will develop competence and confidence with a set of tools and methods for product design and development.
- The student will develop awareness of the role of multiple functions in creating a new product (design, engineering, production).
- The student will coordinate multiple, interdisciplinary tasks in order to achieve a common objective.
- The student will develop enhanced team working skills.

Parents/Families may assist their children by:

- encouraging them to review ideas and concepts discussed in class
- subscribing to age-appropriate industrial/technical magazines and encouraging them to read these materials or by visiting their local library
- spending time with them measuring small items to the nearest 1/16"
- discussing and shopping for home improvement items
- reinforcing step-by-step procedures
- helping them to understand the importance of safety rules and regulations
- encouraging the use of technology to gather data

Introduction to Technical Careers (M4803)

The student will be exposed to a variety of high-demand careers in the technical industry, including electrical, plumbing, carpentry, and remodeling. The student will have the opportunity to research and practice hands-on skills. (Prerequisites: Woodworking and Metalworking or teacher approval) Assessment includes teacher-made tests, in-class assignments, projects and presentations.

Course Objectives

- The student will learn and apply safety protocols in the technical classroom.
- The student will identify and utilize a variety of tools and measurement skills specific to technical careers addressed in the course.
- The student will research a variety of technical careers and will present their research in written and oral formats
- The student will read and analyze technical plans.
- The student will participate in a group construction project.

Woodworking and Metalworking (M4801)

In Woodworking and Metalworking, the student will be introduced to real-world life and job skills to enable the student to create projects and solve problems. The student will become well acquainted with the tools, methods and techniques involved in working with materials. The student will have the opportunity to work with both woods and metals, as well as develop math and communication skills. Areas of study will include safety, layout, hand tools, and power tools. Assessment includes teacher-made tests, in-class assignments, projects and presentations.

Course Objectives

- The student will learn and apply safety protocols in the technical classroom.
- The student will read and develop plans for creating projects.
- The student will use measurement, hand, and power tools to construct projects.
- The student will utilize basic mechanical drawing tools to create simple, multi-view drawings.
- The student will demonstrate the ability to finish projects involving sanding, painting, filing, staining, and finishing.

Visual Arts

Introduction to Art (M7503)

The student in Introduction to Art will explore painting, sculpting, printmaking, drawing, design, mixed-media, and ceramics (clay). This course will provide the opportunity to apply the elements and principles of design as well as strengthen skills in critiquing, interpreting, and discussing works of art.

Course Objectives

- The student will produce art in the areas of drawing, painting, sculpture, ceramics, and printmaking.
- The student will understand and apply the elements of art.
- The student will understand and apply the principles of design.
- The student will explore and develop an understanding of the role of art in the world, various art styles, and historical periods or cultures.
- The student will critique and interpret works of art.

2-Dimensional Art (M7501)

The student in 2-D Art will explore drawing, painting, printmaking, and design. This course will provide the opportunity to apply the elements and principles of design as well as strengthen skills in critiquing, interpreting, and discussing works of art. (Prerequisites- Introduction to Art or teacher approval)

Course Objectives

- The student will produce art in the areas of drawing, painting, design, and printmaking.
- The student will understand and apply the elements of art.
- The student will understand and apply the principles of design.
- The student will explore and develop an understanding of the role of art in the world, various art styles, and historical periods or cultures.
- The student will critique and interpret works of art.

3-Dimensional Art (M5702)

The student in 3-D Art will explore sculpture, ceramics (clay), and design. This course will provide the opportunity to apply the elements and principles of design as well as strengthen skills in critiquing, interpreting, and discussing works of art. (Prerequisites: Introduction to Art or teacher approval)

Course Objectives:

- The student will produce art in the areas of sculpture, ceramics, and design.
- The student will understand and apply the elements of art.
- The student will understand and apply the principles of design.
- The student will explore and develop an understanding of the role of art in the world, various art styles, and historical periods or cultures.
- The student will critique and interpret works of art.

Parents/Families may assist their children by:

- providing opportunities for them to visit museums and galleries
- asking them to share what they are learning in art class
- providing them with basic art supplies and materials
- stressing the importance of elective courses in students' academic development
- encouraging them to complete assignments in a timely manner and to the best of their ability

Studio Art (M7510)

Students will choose which 2D or 3D media and materials they will explore and use to create art. Students will plan, research, experiment, and develop ideas to build their own projects. Media can include but is not limited to drawing, painting, printmaking, ceramics, sculpture, and fibers. (Prerequisites: Intro to Art and 2-D or 3-D)

Course Objectives:

- The student will conceive and develop new artistic ideas and work
- The student will Interpret and share artistic work
- The student will understand and evaluate how the arts convey meaning
- The student will relate artistic ideas and work with personal meaning and external context.

Parents/Families may assist their children by:

- providing opportunities for them to visit museums and galleries
- asking them to share what they are learning in art class
- providing them with basic art supplies and materials
- stressing the importance of elective courses in students' academic development
- encouraging them to complete assignments in a timely manner and to the best of their ability

World Languages and Cultures

Exploring World Languages and Cultures (M1605)

Students in Exploring World Languages and Cultures will be introduced to the French, Spanish and German cultures and languages. Students will experience language through the use of basic phrases and simple conversations in French, German and Spanish and will engage in French, Spanish and German cultures by exploring traditions and lifestyles (including holidays, food, local practices, and geography) through interactive activities. Through participation in this course, students will be able to make informed decisions in selecting languages for further study.

Course Objectives

- The student will explore the concept of culture including traditions and lifestyles of French-, German-, and Spanish-speaking countries.
- The student will connect geography of the world to the perspectives and practices of the various French-, German-, and Spanish-speaking countries and cultures.
- The student will comprehend and use basic pleasantries and daily phrases to express personal information (such as preferences and feelings).
- The student will engage in simple conversations with peers to practice basic vocabulary (such as greetings and travel phrases).

Investigating a World Language (French, German or Spanish) (M6501)

Students in Investigating a World Language will experience a new language through conversation, vocabulary and culture and engage in cultural activities that allow them to expand their global interests. Students will connect topics like food and family to their own lives, learn basic conversational phrases (including preferences) and explore the geography and lifestyles of the target language. Students will be able to have short conversations in the target language to gain confidence in speaking with others. This course is recommended for students planning to continue studying a World Language in 8th grade or High School. (The target language may vary based on teacher certification)

Course Objectives

- The student will comprehend and present basic information about self, likes and dislikes, and every day activities using practiced or memorized words and phrases.
- The student will request and provide basic information by asking and answering a few simple questions on very familiar and everyday topics, using a mixture of practiced or memorized words and phrases.
- The student will express and react to basic needs and preferences related to familiar and everyday activities, using a mixture of practiced or memorized words and phrases in simple conversation.
- The student will research and identify typical products and practices related to everyday life with respect to their own and other cultures.

Parents/Families may assist their children by:

- encouraging them to practice their language
- asking them if they have completed assignments and homework
- making sure they are practicing current Spanish vocabulary and verb lists (flash cards are very helpful)
- asking them about completion of their daily in-class journal for Spanish language and culture
- having them bring their textbook home when they need to study
- helping them with drills for weekly quizzes and tests
- looking for opportunities for them to experience the culture of foreign countries, exhibits, films, theatrical performances and vacations

Additional Curriculum Offerings

English Learners

Introduction to the English Language

The Introduction to the English Language course is intended to support English Language acquisition in the areas of academic language and disciplinary content vocabulary and context. The course is designed for the non-native English speaker testing at the beginning level of English proficiency. Students will practice oral fluency as well as reading and writing skills.

Course Objectives:

- The student will communicate for social and instructional purposes within the school setting.
- The student will communicate information, ideas and concepts necessary for academic success in the content area of language arts.
- The student will communicate information, ideas and concepts necessary for academic success in the content area of mathematics.
- The student will communicate information, ideas and concepts necessary for academic success in the content area of science.
- The student will communicate information, ideas and concepts necessary for academic success in the content area of social studies.
- The student will engage in academic research in English on various topics in the content areas.
- The student will read, discuss, and analyze texts in English in the content areas.
- The student will write and respond to texts in the content areas.
- The student will discuss content specific topics and orally present information to an audience.

Gifted (STRETCH)

The middle school gifted curriculum continues to incorporate the core curricular areas as an instructional foundation. Activities for the students in sixth, seventh and eighth grades are designed to continue challenging higher level thinking skills, problem-solving techniques, creativity, research skills and to promote an understanding of self, others and the world. Opportunities in contests and competitions continue to stimulate achievement in a wider variety of areas. Gifted students have opportunities to explore a wide range of topics, thus encouraging life-long learning. In order to correctly identify as many gifted students as possible, a uniform multi-criteria screening process is necessary. The following battery of tests and inventories are used in accordance with state guidelines to determine eligibility for gifted education:

- Ability Tests
- Achievement Tests
- Creativity Tests
- Parent and teacher surveys of student behaviors and characteristics

Course Objectives

- apply higher level research skills and utilize a variety of resources to develop a knowledge base for use in product development
- utilize the higher level thinking skills of analysis, synthesis and/or evaluation
- demonstrate the necessary skills to recognize and solve a problem
- exhibit the creative thinking skills of fluency, flexibility, originality and elaboration on written, oral and/or visual presentations
- gain self-awareness and develop interpersonal skills

Parents/Families may assist their children by:

- watching the news together and discussing current events
- encouraging them to take a chance on a new activity
- reading and discussing the novels they are reading for gifted class
- visit museums, art galleries, educational institutions, historical places, etc.

Recommended reading for parents:

- "Guiding the Gifted Child" by James T. Webb, Ph.D., Elizabeth Meckstroth, M.S.W. and Stephanie S. Tolan, M.A.
- "When Gifted Kids Don't Have All the Answers" by Jim Delisle, Ph.D. and Judy Galbraith, M.A.
- "Teaching Gifted Kids in the Regular Classroom" by Susan Winebrenner

Guidance and Counseling

The Mehlville School District's Guidance and Counseling Department offers seventh grade students an opportunity to develop skills in understanding and accepting self and others, making decisions, improving study and learning skills, understanding the effects of drugs and alcohol and planning for school and the world of work.

Assessment may include counselor/teacher/ student/parent observations, conferences and classroom activities.

Course Objectives:

- effectively manage time and class/homework materials through use of a planner or daily assignment sheets
- identify extracurricular activities that match personal interests and future goals
- relate academic skills to career goals
- identify school and community rules of alcohol and drug involvement via class discussions and reading of the handbook
- demonstrate knowledge of the effects of drugs and alcohol on the mind and body
- identify possible solutions to problems through brainstorming and goal setting
- identify personal values and competencies
- describe effective techniques to get along with others

Parents/Families may assist their children by:

- encouraging them to seek adult help when necessary
- modeling appropriate behaviors, including good listening skills
- stressing the need for following school rules and those of society
- affirming children on a daily basis and discussing special interests
- maintaining effective communication with the school

Library Media

In support of district curriculum, the Library Media Center provides student access to technology and information in a variety of formats.

Assessment includes librarian and teacher observations of student skills and performances. Teacher-assigned projects are used as assessments.

Course Objectives

- demonstrate knowledge of resources available in the library
- determine information needed and effectively utilize materials necessary to meet any class assignment or personal interest
- follow guidelines regarding proper use of materials
- participate in the research process by evaluating the accuracy, appropriateness and effectiveness of available information
- independently read a variety of materials for information or personal interest

Parents/Families may assist their children by:

- visiting the public library with them
- setting an example by checking out materials from the library
- becoming familiar with the electronic catalog and library resources
- reading with them
- asking them about books they are reading

Special Education

Special School District (SSD) provides special education and related services for students with educational disabilities in the Mehlville School District. In collaboration with partner districts, Special School District provides technical education and a wide variety of individualized educational and support services designed to ensure the student's successful contribution to our community.

If you suspect that your child may have an educational disability and require an evaluation for special education, you should contact your child's teacher, school counselor, or principal.

Websites to Help Your Child in School

Prior to publication of this document, each site below was checked for appropriateness. The Mehlville School District is not responsible for any content or advertisements housed/published on these sites.

[Discovery Education Homework Help \(K-12\)](#)

Contains over 700 homework links

[Basic Steps in the Research Process \(7-12\)](#)

[How to Study \(5-12\)](#)

Tips on test taking, note taking, managing study time, building vocabulary and more

[Research Skills](#)

Help with choosing a research topic and steps in the writing process

[Homework Helper Ref Desk \(K-12\)](#)

Links to subjects organized by grade level

[Kid Info \(2-12\)](#)

Homework site for students, teachers and parents

[Jiskha Homework Help \(3-12\)](#)

Virtual encyclopedia of facts and figures

[Fact Monster \(3-12\)](#)

All subjects; games, quizzes, homework center and more

[The History Place \(5-12\)](#)

How to write a better history paper

[Homework Center](#)

[Info Please](#)

Reference materials and homework help in various subjects

[Web Math](#)

Interactive homework help in pre-algebra, algebra, geometry, trigonometry, calculus, statistics and real-world math

[A+ Math \(3-12\)](#)

Helps students improve math skills with flashcards, games, worksheets and homework help

[First Gov for Kids \(K-12\)](#)

U.S. government site that provides links that cover a variety of topics

[Ben's Guide to US Government \(K-12\)](#)

Government resources for students, parents and teachers

[High School Ace \(9-12\)](#)

Academic homepage for high school students

[Education Resources \(K-12\)](#)

Practice in all subject areas at all levels

[4 Kids](#)

Weekly articles and links demonstrating how online learning can be a safe, fun and adventurous activity

[Kids Health](#)

[President's Council on Sports, Fitness and Nutrition](#)

Health and Fitness

[Nutrition](#)

A user-friendly nutrition site with games, activities and posters for students and adults

World Book Online Web

World Book Online, a grade-appropriate research tool that includes encyclopedias, multimedia, eBooks, and primary source databases is available to Mehlville students both at school and at home. The online reference tool developed by education experts also includes a time-line builder, citation builder, individual research accounts, a translation tool generating content in thirty languages, text-to-speech feature, video tutorials, interactive activities, magazine articles, newspapers and the following databases:

- World Book Kids – encyclopedia for elementary school students age 7 and up
- World Book Student – encyclopedia for middle school and high school students age 11 and up
- World Book Advanced – encyclopedia for high school and college students age 13 and up
- Living Green – online interactive site that examines causes of pollution and offers tips on green practices
- Early Peoples – online interactive site that examines history of ancient cultures
- Inventions and Discoveries – online, interactive site that examines inventions and discoveries
- Dramatic Learning – uses plays, skits and monologues to help students become more fluent readers and help them understand core concepts and retain information
- Early World of Learning – narrated stories, interactive games and reference materials to help young learners

To Access World Book Online:

- Go to <http://mehlilleschooldistrict.com>
- Select Parents/Students
- Select Library Resources
- Go to World Book Online

World Newspapers: Located on the upper left side of the World Book Advanced home page is Research Tools. Within the Research Tools is World Newspapers which provides newspapers from the United States and around the world.

To access a newspaper:

- Select World Newspapers on the World Book Advanced home page
- Choose a location from around the world
- Click GO