1. **Grades K-3 (Grades K-1: 1 period/week beginning in February; Grades 2-3: 1 period/week – full year)**
   
   i. **Gifted Math**
   
   1. The gifted math unit was created for the kindergarten through third grade gifted and talented program of Marlboro Township Public Schools to provide extension and gifted activities in the academic content area of mathematics for those students who show need of further challenge in this subject.
   
   2. The lessons are designed to:
      
      a. Provide students with opportunities to develop mathematical skills at the appropriate levels to enable students to develop critical analysis, thoughtful synthesis, logical deduction, and insightful problem solving,
      
      b. Create an atmosphere in which teachers support students and students support one another in the exploration and discovery of mathematical concepts.
      
      c. Create opportunities to extend math concepts across a variety of curricular areas and across grade levels that connect math to the real world.
      
      d. Develop activities and cooperative situations to develop the metacognitive, temporal spatial and lateral thinking skills of students.
   
   ii. **Gifted Reading**
   
   1. The purpose of the gifted reading program, created for the kindergarten through third grade gifted and talented program of Marlboro Township Public Schools, is to challenge the students identified as needing a gifted reading program. The students will be exposed to different literary genres in whole, small, and individual groupings. Students will be expected to become independent and more sophisticated readers through explicit instruction and consistent modeling of reading comprehension strategies.
   
   2. These strategies include inferring, asking questions, making connections, determining importance in text, creating mental images, and synthesizing information. Ultimately, the students will be responsible for sustaining meaningful discussions by applying the above comprehension strategies in textual analyses.

2. **Grade 2 Primary Enrichment Program/PEP (3 periods/week)**
   
   i. **“Protecting our Planet”**
   
   1. The goal of “Protecting Our Planet” is to foster an awareness of the characteristics, location, complexity, and importance of the world’s tropical rainforests; to encourage students to value these biomes; and to empower students to participate in protecting these environments.
   
   2. The focus will be on developing critical thinking through analysis and evaluation of fiction and nonfiction texts about rainforests. Reading comprehension, auditory comprehension, writing, and guided discussion to sharpen critical reasoning ability will be emphasized. Lessons will cover a variety of essential skills and draw from several disciplines including language arts and literature, science, social studies, the creative arts, and technology.
ii. “It’s a Soar Subject”

1. The purpose of “It’s a Soar Subject” is to engage students in learning and in applying the scientific method to things that fly. Students will conduct experiments to understand the properties of air and four aerodynamic forces: lift, thrust, drag and gravity.

2. Students will construct and test the flight capability of various objects and analyze their efficiency in terms of aerodynamic principles.

iii. “Oh, The Thinks You Can Think”

1. The purpose of “Oh, The Thinks You Can Think” is to introduce the specific components of creative and critical thinking and to engage students in a variety of activities to develop their understanding of and mastery in applying these skills.

2. Students will have an opportunity to synthesize all of these skills in a culminating final project.

3. Grade 3 Primary Enrichment Program/PEP (3 periods/week)

i. “Creative Encounters with Tales” (including “Multicultural Cinderella”)

1. Storytelling originated in the oral tradition. Certain conventions of storytelling made tales more memorable. Even when stories were written down, certain patterns were preserved in literary elements and motifs. These stories entertained and educated their audience. They were intended to transmit cultural and societal values and to preserve traditions from one generation to the next.

2. The goal of this unit is for our students to appreciate the oral tradition; to understand different cultures and traditions; to recognize literary elements; and to demonstrate the skills of the oral tradition.

ii. “Follow the Leader”

1. This unit was created to inspire leadership attitudes in students and to establish a culture of leadership that will continue throughout their lives. The lessons are designed to:

   a. Develop knowledge of self and others;
   b. Define leadership;
   c. Develop leadership skills and practices; and
   d. Practice leadership through service.

   Familiar and lesser known leaders in various fields are considered as well as the differing ways in which leadership may manifest itself in individuals.

2. Throughout this unit the skills of critical thinking (analysis, synthesis, application and evaluation) as well as the creative thinking skills (fluency, flexibility, elaboration, and originality) will be reintroduced and developed.

iii. “Dive In and Discover: Understanding the Scientific Method through an Investigation of Oceanography”

1. The lessons are designed to promote the development of skills upon which students may build as they explore the world of science in subsequent units. Oceanography ideally lends itself to such an investigation because it is an amalgamation of the physical, chemical, biological, and geological sciences. Skills learned in this unit will have broad applicability to all further scientific study.

2. The unit culminates in an advocacy project wherein students can explore and
apply their knowledge to impact others in a real world manner. The extensive research that still needs to be done in exploring and understanding the ocean gives students an opportunity to envision themselves as important future contributors to this field.

4. Grade 4 Realizing Excellence through Academic Challenge/REACH (4-5 periods/week)
   i. "Legal Eagles"
      1. The purpose of the "Legal Eagles" curriculum is to prepare students to be knowledgeable and productive members of our country by introducing them for the rights and responsibilities of citizenship.
      2. It was designed in order for students to understand the purpose of government, specifically the political and human rights principles which America was founded upon as well as the structural framework of the federalist government as outlined by the Constitution and Declaration of Independence.
   ii. "Beautiful Minds, a Study of the Nature of Genius"
      1. The purpose of this unit is to explore the physical brain and the brain/mind dichotomy.
      2. Students will explore the theory of multiple intelligences; the characteristics of genius; Gardner’s examples of genius in the various intelligences; and habits of thinking shared by geniuses.
   iii. "Monsters, Mysteries and More"
      1. The purpose of “Monsters, Mysteries and More” is to be able to use sources of information to support a specific point of view in a debate.
      2. The students will develop research skills using multiple sources of information supporting or disproving the existence of various phenomena.

5. Grade 5 Realizing Excellence through Academic CHallenge/REACH (4-5 periods/week)
   i. “Creative Concoctions”
      1. The purpose of “Creative Concoctions” is to introduce the relationship between culture, technology and inventions and engage students in a variety of creative exercises to expand their inventiveness and playfulness with materials to solve specific problems.
      2. Students will come to understand what motivates inventors and the cultural, historical and technological context where inventions are created.
   ii. “Science Fiction”
      1. The purpose of the “Science Fiction” unit is to help students foster the skills of both critical and creative thinking through an in depth analysis of science fiction stories, articles and other media.
      2. Students will be asked to imagine life on other planets and to explore the possibilities of “what if.” They will compare and contrast the writings of many science fiction authors and note the accuracy of their predictions and the message they chose to convey. In doing this, they will also analyze the various literary elements contained in a story with a major focus on theme.

i. The purpose of the G&T "Science, Technology, Engineering, & Mathematics (STEM) K-5" guide is to engage students in engineering design challenges that spiral in sophistication from Kindergarten through grade 5. The design concepts and parameters are related to the units for each respective grade level's G&T curriculum.

ii. Students will participate in the nonlinear engineer design process: identifying a problem or need; conducting research; generating alternative solutions; selecting the most appropriate plan; creating a prototype; testing, evaluating, and, if necessary, redesigning the prototype; and presenting final conclusions. Students will encounter challenges related to the real world and/or current issues requiring peer collaboration and an understanding of fundamental concepts in the disciplines constituting STEM.

7. Grades 2-5 G&T Philosophy

i. The newly created unit "Philosophy," for students in the grades 2-5 Gifted & Talented programs PEP and REACH, was designed to engage students in the process of self-discovery and critical thinking about the individual, our society, and the world through the positing and pondering of fundamental, enduring questions. "Philosophy," derived from the Greek φιλοσοφία meaning "love of wisdom," seeks to inspire students to ask questions arising from their natural curiosity as children and their intellectual curiosity as gifted learners. Student activities and resultant discussions should achieve the highest levels of critical thinking since there are no absolute answers and the endeavor truly may be characterized as a pursuit of wisdom per se arising from a love of learning.

ii. Students will be engaged in developmentally appropriate investigations of key concepts, as well as historical categories and schools of thought, in philosophy. "Philosophy" unit lessons will create a learning environment wherein higher order reasoning, critical inquiry, and open discussions create intellectual pathways to consideration of grand, perennially intriguing questions and ideas associated with self-understanding as individuals; understanding our place in society; and understanding the influence and the impact of our varying perceptions of, and perspectives on, the world around us.