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The interdisciplinary problem-based curriculum includes a focus on real world applications.

The staff at Munster High School is dedicated to promoting an interdisciplinary problem-based curriculum which includes a focus on real-world applications. The administration and teachers believe that in order for students to succeed in the global information and technology economy, they must be able to explore new ideas and theories through an integrated curriculum, which develops their ability to create authentic solutions to real world problems and prepares them for both postsecondary education and the workplace.

Students at Munster High School are challenged and apply their learning by completing performance tasks in all subject areas. In Physics I, students develop a plan for survival both during and after the Zombie Apocalypse. Math students design a sports stadium that meets the very specific requirements of their client. These performance tasks not only meet the Indiana State Standards for science and math, but also meet the science and math standards for the International Baccalaureate Program. MHS has also partnered with Quarknet, an international organization of particle physicists working with high school teachers and high school students, to provide students an opportunity to work on engineering projects as part of the nationally recognized Project Lead the Way (PLTW) program. The PLTW curriculum is used by all Quarknet sites in the United States and internationally.

The opportunity to participate in STEM activities is not limited to the traditional STEM disciplines; we are reaching the arts as well. The Artist Influence Series project requires students to compile research through technological internationally based museum and gallery websites, biographical and professional critical periodicals and journals in order to reflect on the historical and contemporary trends within a culture, and explore life experiences and possible career tracks within those societies and in today's marketplace integration of technology, history, sociology, cultural anthropology, communications, and visual art and design through analytical research meets both the state and national standards in art education.

The resource calendar also provides evidence of interdisciplinary groups within our school working together to create more authentic learning experiences. Currently, teachers are provided time on Thursday mornings to work together to develop more interdisciplinary activities. The leadership teams at MHS are trying to find ways to provide even more time for interdisciplinary collaboration next year. Both the Trebuchet and Arena projects are authentic examples of problem-based interdisciplinary experiences. The Arena project requires students to use their math skills to determine the best solution to economic issues encountered in designing a sports stadium. PLTW students look at actual data from CERN and then use math probabilities to identify each particle and determine how it fits into the Quantum Mechanical model. Other PLTW projects that provide students an opportunity to develop STEAM skills include the Affordable Housing project, Recyclable Materials project, and the Majority Vote project. In addition, all students are required to take College and Career Readiness, a course designed to help students plan for college and the workplace. This course also includes a performance task that integrates the skills taught in the classroom with real world situations.

The administration and staff at MHS has worked very hard to ensure all students have an opportunity to develop the skills necessary to discover solutions to any issues or problems they may face in an ever-changing world. However, despite the staff's commitment to providing interdisciplinary STEM experiences for all students, an area that needs to be improved is the ability for departments to collaborate on projects so students will understand that real problems are not restricted to any one discipline but incorporate aspects all

disciplines. Currently it is difficult to arrange time for teachers to meet during the school day; the administration and school leadership teams are working together to address this issue.