Robotics

Course Objectives
Robotics will provide students with the opportunity to solve conceptual and real-world problems using the Engineering Design Process utilizing a hands-on, team-based approach. The focus of this course will allow students to design, implement and, in some cases, program (VEX) robots. Students will complete four major projects, each ending with a friendly competition to see which teams’ robot best met the specifications of the project.

Instructional Methods
Students will design their first robot from a pre-fabricated blueprint. After that, they will be required to design their robots from scratch. Student-lead class discussions will be the basis for the design and implementation of subsequent projects. The instructor will aid in the teaching/learning of advanced concepts as required. A reflection is required at the end two of the units, from each student, to help them synthesize the concepts they have learned.

Grading:
- Quizzes: 30%
- Unit Reflections: 35%
- Engineering Worksheets: 25%
- Final Exam: 10%

Course Website
The course website is located at http://www.aps-techengineering.org. Click on the Robotics menu located on the left hand side of the screen. Important course documents such as the syllabus, rubrics, assignments, and reminders will be posted here.

Student Attendance, Conduct & Expectations
Per the attendance policy, more than five unexcused absences from class will result in a 10% reduction to your grade at end of the trimester. Please see student handbook for more details.

Creating a learning environment where every student can learn is very important. Students are expected to respect one another, faculty, and the school campus. AHS has a zero tolerance policy for bigotry and prejudice. You will be asked to leave if you use any inflammatory language.

Please refrain from eating or drinking in the lab. Water is ok, but please keep it on the floor next to your chair or in your bag. In accordance with school policy, you will be asked to throw food away that is brought in to the classroom.

Acceptance of Receipt and Understanding of the Content of this Syllabus (Robotics)
Please sign, have your parents sign, and return this portion of the syllabus affirming that you understand the information contained in this document. You should retain the upper portion of the syllabus throughout the trimester. Parents are encouraged to check the website frequently, and to use the contact form (to be added)

__________________________ __________________________ __________________________
Your Name (Printed) Your Signature Parent Signature

Parent Email (Optional): ________________________________