

# Physics Syllabus

Year	2018-2019
Required Resources	Textbooks/Workbooks (to include composition books) <a href="#">MackinVIA</a>
Process Skills	<ul style="list-style-type: none"> <li>- Design and implement investigative procedures</li> <li>- Organize and evaluate data</li> <li>- Make inferences from charts, tables, and graphs</li> <li>- Communicate valid conclusions supported by data</li> </ul>
Syllabus	<p><b>1<sup>st</sup> Nine Weeks</b>  <i>Algebra Skills Pre-Test</i>            Physics Skills: Significant Figures, Scientific Notation, Dimensional Analysis, Manipulation of Formulas, Precision, and Accuracy            Kinematic in One Dimension and Graphing Motion            Two Dimensional and Circular Motion</p> <p><b>2<sup>nd</sup> Nine Weeks</b>            Newton's Laws (Vectors, 2D Free Body Diagram, Mass v. Weight)            Universal Gravitation (Free Body Diagram, Mass v. Weight)            Conservation of Energy (Work and Power, PE and KE)</p> <p><b>3<sup>rd</sup> Nine Weeks</b>            Conservation of Momentum (Collision Theory: Elastic and Inelastic)            Mechanical Waves and Electromagnetic Waves            Optics and Snell's Law            Thermodynamics</p> <p><b>4<sup>th</sup> Nine Weeks</b>            Electrostatics (Coulomb's Law)            Current Electricity (Ohm, R-Series, Parallel, Power)            Magnetic Fields            Atomic, Nuclear, and Quantum Physics            Physics is Everywhere</p>

