

# 4<sup>th</sup> Nine Weeks: Scope and Sequence-Dumas

Content Standards	Dates Taught	% of Students scoring over 70%	Dates Re-taught (Optional)	Formative and Summative Assessments/ (Any Additional Comments Optional)
<p><b>ACOS(6) Describe wave behavior in terms of reflection, refraction, diffraction, constructive and destructive wave interference, and the Doppler effect.</b></p> <ul style="list-style-type: none"> <li>Explaining reasons for differences in speed, frequency, and wavelength of a propagating wave</li> <li>Describing uses of different components of the electromagnetic spectrum, including radio waves, microwaves, infrared radiation, visible light, ultraviolet radiation, X-rays, and gamma radiation</li> <li>Demonstrating particle and wave duality</li> <li>Describing the change of wave speed in different media</li> </ul>				
<p><b>ACOS(7) Describe properties of reflection, refraction, and diffraction</b>            &gt;Examples: Tracing the path of a reflected light ray, predicting the formation of reflected images through the tracing of rays</p> <ul style="list-style-type: none"> <li>Demonstrating the path of light through mirrors, lenses, and prisms            &gt;Example: tracing the path of a reflected light ray through prisms using Snell's law</li> <li>Describing the effect of filters and polarization on the transmission of light</li> </ul>				
Chapters 11-15 for the above				
<p><b>ACOS (8) Summarize similarities in the calculation of electrical, magnetic, and gravitational forces between objects.</b></p> <ul style="list-style-type: none"> <li>Determining the force on charged particles using Coulomb's law</li> </ul>				
<p><b>ACOS (9) Describe quantitative relationships among charge, current, electrical potential energy, potential difference, resistance, and electrical power for simple series, parallel, or combination direct current (DC) circuits.</b></p>				