

<b>Essential Understandings</b>	<ul style="list-style-type: none"> <li>The laws of exponents are very important to future mathematical work.</li> </ul>
<b>Essential Questions</b>	<ul style="list-style-type: none"> <li>What are the multiplication laws of exponents?</li> <li>How do I evaluate powers with negative exponents?</li> <li>How do I evaluate powers with zero as their exponent?</li> <li>What are the division laws of exponents?</li> </ul>
<b>Essential Knowledge</b>	<ul style="list-style-type: none"> <li>There are many multiplication laws of exponents.</li> <li>There are rules for negative exponents.</li> <li>There are rules for zero as an exponent.</li> <li>There are many division laws of exponents.</li> </ul>
<b>Vocabulary</b>	<ul style="list-style-type: none"> <li><u>Terms:</u> <ul style="list-style-type: none"> <li>power, base, exponent, product of powers property, power of a power property, power of a product property, zero exponents, negative exponents, quotient of a powers property, power of a quotient property</li> </ul> </li> </ul>
<b>Essential Skills</b>	<ul style="list-style-type: none"> <li>Use the multiplication laws of exponents.</li> <li>Evaluate powers with negative exponents.</li> <li>Evaluate powers with zero as their exponent.</li> <li>Use the division laws of exponents.</li> </ul>
<b>Related Maine Learning Results</b>	<p><u>Mathematics</u></p> <p>A. Number  Real Number  A1.Students will know how to represent and use real numbers.  c. Compute using laws of exponents.</p> <p>D. Algebra  Symbols and Expressions  D1.Students understand and use polynomials and expressions with rational exponents.  a. Simplify expressions including those with rational numbers.</p>
<b>Sample Lessons And Activities</b>	<ul style="list-style-type: none"> <li>Students will orally respond to questions.</li> <li>Students will utilize worksheets and in their notes to demonstrate individual understanding of the concepts.</li> </ul>
<b>Sample Classroom Assessment Methods</b>	<ul style="list-style-type: none"> <li>Quizzes</li> <li>Take-home worksheets</li> <li>Tests</li> </ul>
<b>Sample Resources</b>	<ul style="list-style-type: none"> <li><u>Publications:</u> <ul style="list-style-type: none"> <li><u>Algebra</u> -Foerster</li> </ul> </li> </ul>