

# LEARNING PLAN on Fractions

<p><b>Exploratory Activities</b></p> <ul style="list-style-type: none"> <li>• Fraction Book</li> <li>• Hershey Bar Math</li> </ul>	<p><b>CONCEPT</b></p> <ul style="list-style-type: none"> <li>• Comparing Fractions</li> <li>• Determining Equivalent Fractions</li> <li>• Converting Fractions (for grades 5-6)</li> </ul>
<p><b>Concept Development Activities</b></p> <p>Compare and Order Fractions          Fractions: Part of a Region or Set          What is Rock 'N' Roll?          Understanding Equivalent Fractions          What Happens If You Watch TV All Day?          Equivalent Fraction Patterns          Equivalent Fraction Riddle          Cryptic Quiz          Which Way?          Ribbit-ing Proportions          Our Class' Favorite Colors-From Bar Charts to Pie Charts          Fractions to Decimals          What Are the Titles?          Football Math-Team Statistics          It Adds Up-Pet Survey and Airplane Survey          Fraction Bingo          Full of Fractions Learning Center-Fraction Land, Designer Fractions,          Drawing Fun Fractions, Convert-A-Tile and Fraction Tiles</p>	<p><b>Materials and Resources</b></p> <p>Website:  <a href="http://www.math.rice.edu/~lanius">http://www.math.rice.edu/~lanius</a>          Marcy Cook Learning Center Resources:          Convert-A-Tile and Fraction Tiles  <i>School Zone Grade 5 Math</i> by Karen Evans  <i>Learning Horizons Skill Builders</i>  <i>Britannica Fraction Times</i>  <i>The Mailbox Magazine</i> (Oct./Nov. 2001          and Aug./Sept. 2002)  <i>Middle School Math With Pizzazz!</i> by Steve          Marcy, Ph.D. and Janis Marcy, M.A.</p> <p>pattern blocks, square tiles, Hershey bars, 1-in. grid chart paper, triangle grid paper, transparency markers, newspaper sport pages, (graphing) calculators, markers or map pencils</p>
<p><b>Basic Facts and Standard Algorithms Formalized</b></p> <ul style="list-style-type: none"> <li>• Students will demonstrate an understanding of fraction patterns and relationships.</li> <li>• Students will be able to recognize equivalent fractions and be able to change fractions into decimals and percents.</li> <li>• Students will use fractions in real-life situations and discuss how they apply to their everyday lives.</li> </ul>	<p><b>Originality and Creativity</b></p> <p><b>Student Products</b></p> <p><b>Written</b>          Students will create their own problems about fractions and trade with partners to solve.</p> <p><b>Verbal</b>          Students will present data to the class about individual football teams they gathered from the newspaper. The data will be in chart form, so they will talk about each element of the chart and interesting facts about their team.</p> <p><b>Kinesthetic</b>          Students will use Hershey bars to show fractions of a whole. Students will also use manipulatives to show equivalent fractions in the learning center.</p> <p><b>Visual</b>          Students will create a poster displaying two types of graphs (pie chart and bar graph) from "Our Class' Favorite Colors" activity.</p>
<p><b>Assessment</b></p> <ul style="list-style-type: none"> <li>• Observe student progress (Are they presenting data correctly? Can they use fractions in problem-solving situations independently?)</li> <li>• Students may keep a journal about their understanding of fractions. They may also use it for self-evaluation and communication to the teacher.</li> <li>• Discuss with students individually so that their progress may be monitored and weaknesses may be identified.</li> </ul>	
<p><b>Related TEKS/TAKS</b></p> <p><b>TEKS:</b>          (5.1) Number, operation, and quantitative reasoning. The student uses fractions in problem-solving situations.          (5.5) Patterns, relationships, and algebraic thinking. The student makes generalizations based on observed patterns and relationships.</p> <p><b>TAKS:</b>          (Obj. 1)-The student will demonstrate an understanding of numbers, operations, and quantitative reasoning.</p>	