# **Table of Contents**

Introduction
Sample Lesson Plan
Before the Book ( <i>Pre-Reading Activities</i> )
About the Author
Book Summary
Vocabulary Lists
Vocabulary Activity Ideas
SECTION 1 (Chapters 1-3)
SECTION 2 (Chapter 4-6)
<ul> <li>SECTION 3 (Chapters 7-9)</li> <li>Quiz Time</li> <li>Hands-On Project—Chinese Dinner</li> <li>Cooperative Learning Activity—Fiction Fun</li> <li>Curriculum Connections—Tucker's Life Savings</li> <li>Into Your Life—Helping a Friend</li> </ul>
SECTION 4 (Chapters 10-12)
SECTION 5 (Chapters 13-15)
After the Book (Post-Reading Activities)  Research Ideas
Culminating Activity
Unit Test Options
Bibliography of Related Reading
Answer Key

## The Sweet Sound of Music

The cricket is one of many insects which is able to produce a musical sound. The cricket produces its musical chirp by opening and closing its wings. The wings rub together, causing small, comb-like ridges to make the chirping sound that we hear when we listen to a cricket. This small creature is able to change its song by rubbing together either some or all of the ridges on its wings.

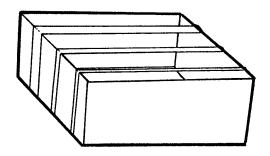
A stringed instrument produces sound in a similar manner. When a string on a guitar is plucked, it causes the string to vibrate. These vibrations are sent into the air and are interpreted as musical sound. The pitch (how high or low the note sounds) depends upon how rapidly or slowly the string is vibrating. A guitar player can change a string's pitch by holding a string tightly to the neck of the guitar. This shortens the string's vibrating length, making the string vibrate faster. A string that vibrates faster produces a higher pitch. Another way to change pitch is to alter the string's thickness.

To demonstrate how pitch is changed in stringed instruments, try the following experiments.

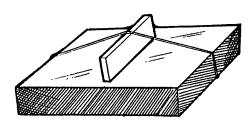
### **Experiment A**

**Materials:** three rubber bands of equal length but different thicknesses; a cigar box with the top removed; craft knife

**Procedure:** Cut three equidistant grooves on each of the two shorter top edges of the box. Place each rubber band lengthwise in the grooves and around the box, as shown. Pluck each rubber band and note the sound. Explain the differences.



### **Experiment B**



**Materials:** a 10" (25 cm) length of plywood or strong cardboard; a piece of cardboard at least 3" (8 cm) in length; 1 yd. (1 m) string

**Procedure:** Tie the string tightly around the length of the board. Place the cardboard strip upright between the string and the board, as shown in the picture. How many different sounds can you make with your instrument? How can you change the note's pitch (make the note higher or lower)? What happens when you remove the piece of cardboard? What happens when you tighten or loosen the string?

Try using dental floss, elastic, rope, or other string-like materials in place of the string to see if you achieve the same results.

## **Experiment C**

Sound is produced by a vibrating object. It travels in waves in all directions, and can travel through solids, liquids, and gases. Test some of these ideas and present your findings to the class. For example, strike a tuning fork against the palm of your hand. Place it to your ear. Through what medium must it travel in order for the sound to reach your ear? Strike the tuning fork and touch it to a desk. Do you hear any sound? Describe it. Now, strike the tuning fork and lower it into a pan of water. What happens?

Research how sound is produced in woodwind, brass, and percussion instruments. If possible, make a model of one of these types of instruments and show the class how the sound is produced.

## Cashing In (Review)

The following game is a fun way to review material before a traditional test, or to review the story at the end of the unit. Divide your class into 2 or 3 teams. Explain that each team will be given a turn to choose a category and money amount from the chart you have drawn on the chalkboard. The team will then be given 30 seconds to answer the category question they have chosen after it has been read. If the team is unable to respond or has an incorrect answer, the question remains on the board and can be chosen by another team. Have teams take turns choosing categories until all the questions have been answered. Keep score by adding the money amounts earned by each team. Team members, within the teams, should take turns choosing and answering questions. The questions that are worth more will tend to be more difficult.

Bellins	Smorgasbord	Chester	Money	Vocab.
\$100	\$100	\$100	\$100	\$100
\$200	\$200	\$200	\$200	\$200
\$300	\$300	\$300	\$300	\$300
\$400	\$400	\$400	\$400	\$400
\$500	\$500	\$500	\$500	\$500

Draw this chart on your chalkboard. After a question has been answered, erase the money amount from the chart so it will not be chosen again.

The game questions are listed below. Answers are on page 48 in the answer key.

#### **Bellinis**

**Unit Test:** Option 3

\$100 What business do the Bellinis run?
--

\$200 How does Mama Bellini feel about Chester the first time she sees him?

\$300 Where is the Bellinis' newsstand located?

\$400 How does Chester's playing help the Bellini family?

\$500 What kind of music does Mama Bellini like?

#### Smorgasbord

\$100 Why does Mario go to Chinatown?

\$200 Why is Chester surprised by Tucker and Harry's friendship?

\$300 How did Chester learn to play "human music"?

\$400 What did Tucker use as a pillow the night he slept in the cricket cage?

\$500 How did the fire in the newsstand start?

### Chester

\$100 How did Chester get from Connecticut to New York?

\$200 How did Mario discover Chester?

\$300 Why was Chester called a jinx?

\$400 Describe one of the games Chester played with Mario.

\$500 Explain how Chester makes his chirping sound.

### Money

\$100 How much did Mario pay for the cricket cage?

\$200 How did Tucker manage to collect so much money?

\$300 Why is money so important to Mama Bellini?

\$400 Who helped Chester replace the two dollars he ate in the Bellinis' newsstand?

\$500 Why do the Bellinis leave the cash register drawer in the newsstand open?

Vocabulary-Define the Word

\$100 scrounging

\$200 jinx

\$300 eavesdropping

\$400 amateur

\$500 entomologist