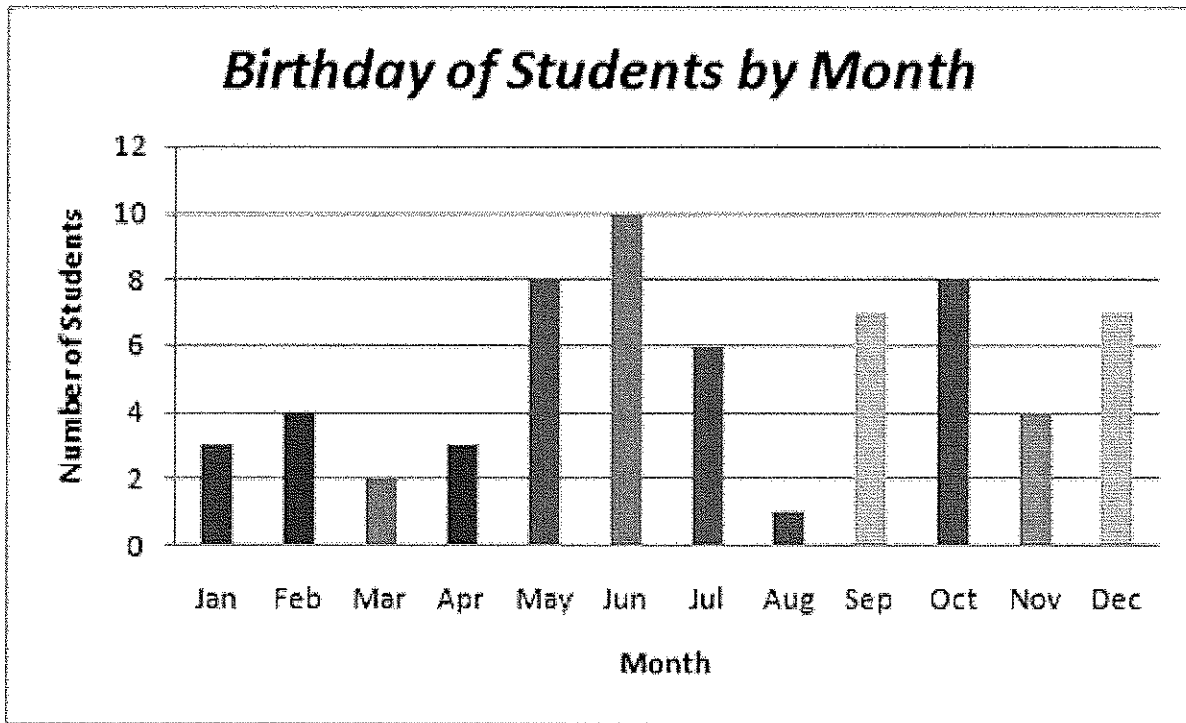# Analyzing Bar Graphs

Name:_____

Birthday of Students by Month
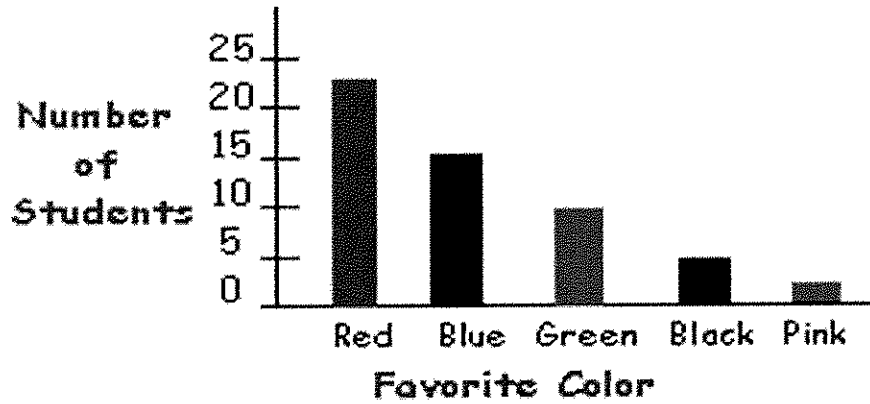

120 Students were surveyed in this graph.

1.) How many student birthday were in October?

2) What PERCENTAGE of students have birthdays in May?

3) What PERCENTAGE of students have birthdays in September? (the best month ☺)

4) If 400 students were surveyed, how many of them would you predict would have birthdays in July?

Student's Favorite Color

150 Students were survey at Herbison Wood Schools

2.) How many favorite color was Blue?

2) What PERCENTAGE of student's favorite color is black?

3) What PERCENTAGE of student's favorite color is Red?

4) If 350 students were surveyed, how many of them would you predict would have a favorite color of green?

Name_____

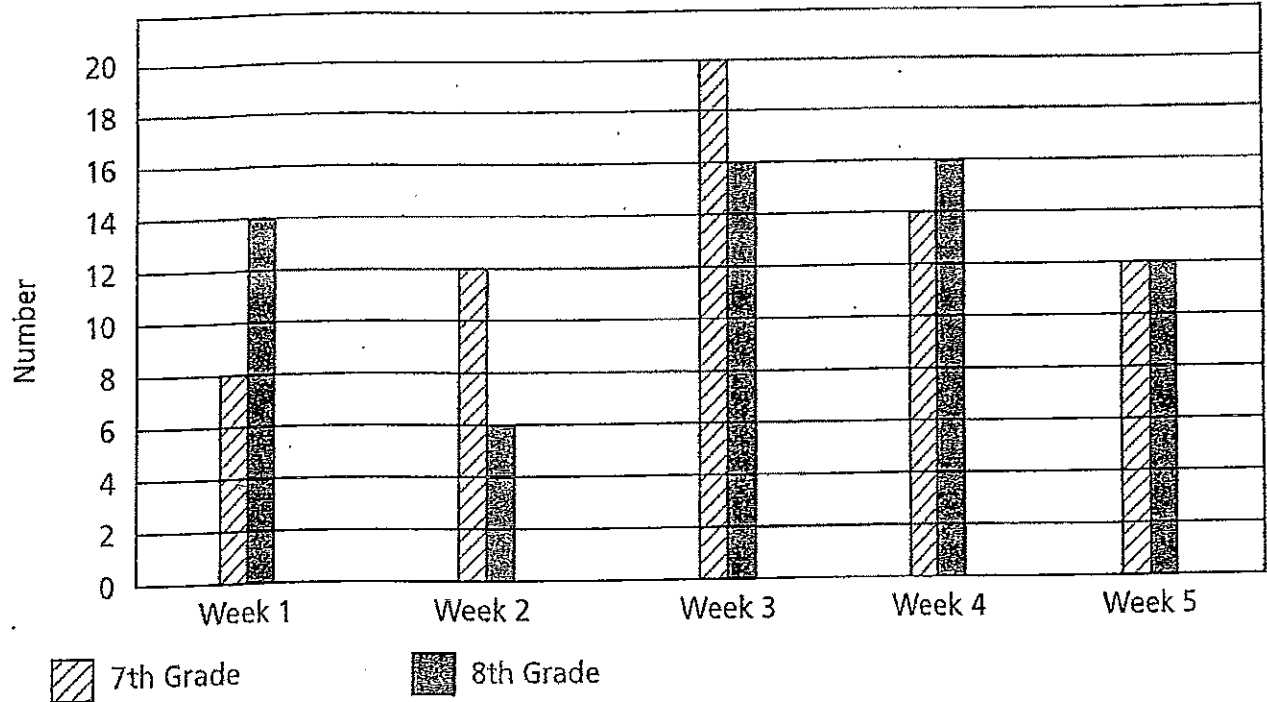A **double bar graph** enables you to compare sets of information.

The seventh and eighth grade classes at Wellbern Middle School participated in a community beautification project. They planted trees over five weekends. This double bar graph compares their results.

TREES PLANTED

Number

| Week 1 | Week 2 | Week 3 | Week 4 | Week 5 |

▨ 7th Grade   ▩ 8th Grade

Use the double bar graph to answer the questions.

A. How many trees were planted altogether? _____

B. What percentage of the trees did the eighth grade class plant? (Round to the nearest percent.) _____

C. During which week was the most planting done? _____

D. What was the greatest number of trees planted by one class in one week? _____

E. How many more trees did the seventh grade class plant than the eighth grade class? _____

F. What was the average number of trees planted per week? _____

G. How many trees were planted during week 2? _____

H. Write a fraction to show how many weeks had less than the average number of trees planted. (Write the fraction in lowest terms.) _____

Name_____

e Jameson Falcons and the Kent Grove Vikings competed in the final basketball game of the season. ate a double bar graph using the information below to show how each team scored per quarter.

Jameson scored 5 more points than Kent Grove in the first and third quarters.

Kent Grove scored 20 points in the second quarter.

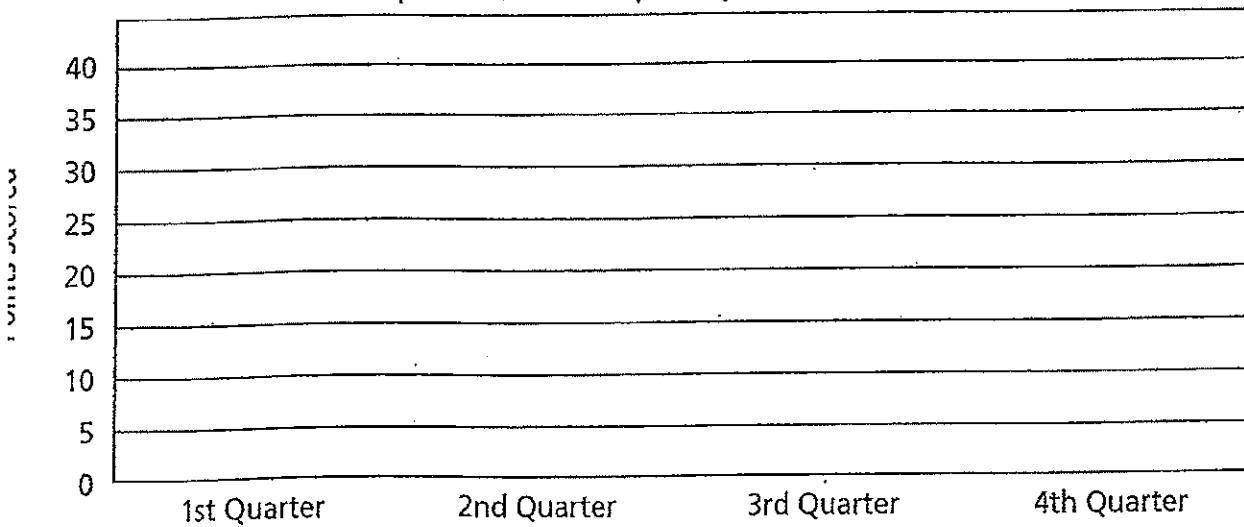Jameson scored 10 points in the fourth quarter.

Kent Grove scored 5 more points in the third quarter than in the second.

Jameson scored 20 points in both the first quarter and the second quarter.

Kent Grove won by 5 points.

FINAL GAME OF THE SEASON

40				
35				
30				
25				
20				
15				
10				
5				
0	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter

▨ Jameson Falcons   ▮ Kent Grove Vikings

e the double bar graph to answer the questions.

♪ How many points did Kent Grove score in the 4th quarter? _____

♪ What was the final score? _____

♪ Which was Jameson's highest scoring quarter? _____

♪ What was Jameson's average score per quarter? _____

♪ What percentage of Jameson's total points were scored in the 2nd quarter? _____

♪ In the 1st quarter, what percentage of the total points were scored by Jameson? (Round to the nearest percent.) _____

Name_____

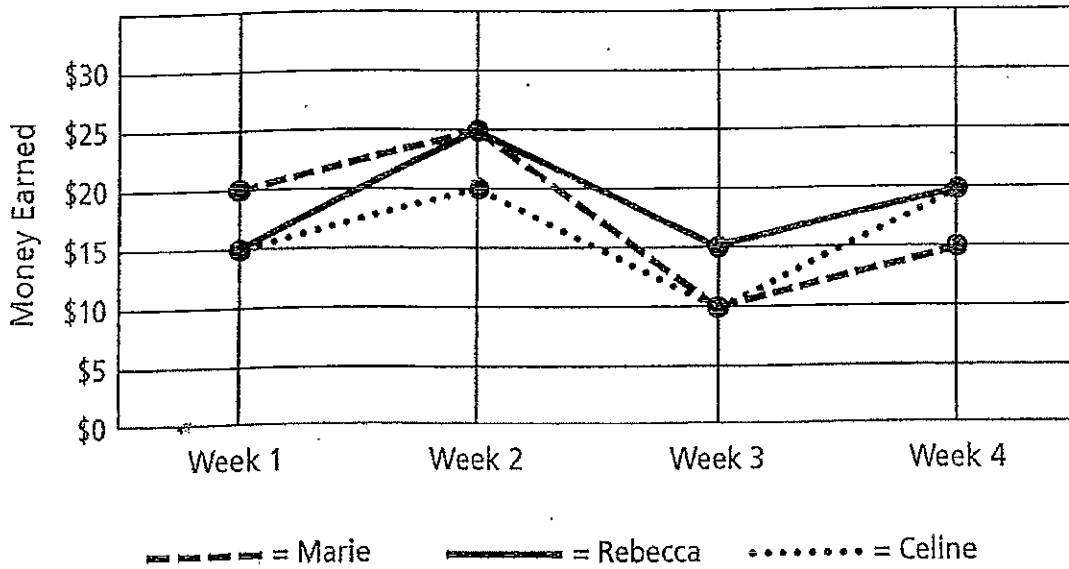With a **multiple line graph** you can use different lines to show and compare information.

Marie, Rebecca, and Celine earn money by babysitting on weekends. They each charge five dollars per hour. This multiple line graph compares their earnings.

BABYSITTING EARNINGS

Money Earned

$30
$25
$20
$15
$10
$5
$0

Week 1   Week 2   Week 3   Week 4

━ ━ ━ ━ = Marie   ━━━━━━ = Rebecca   • • • • • • • = Celine

Use the multiple line graph to answer the questions.

A Who earned the most money? _____

B How many hours did Celine work during the four weeks? _____

C What was the average number of hours that Celine worked per week? (Round to the nearest whole number.) _____

D During which week did the girls work the most hours? _____

E Who worked the fewest hours in the four weeks? _____

F How much money did Marie earn in week 3? _____

G How much money did Marie make altogether? _____

H What fraction of her total hours did Rebecca work during week 1? (Write it in lowest terms.)

_____

I What percentage of Celine's total earnings were made during week 1? (Round to the nearest percent.) _____

Name_____

ere are three main theaters in Garberville. The total price for a movie ticket, a small
ɔ of popcorn, and a small drink has changed over four years. Create a multiple line
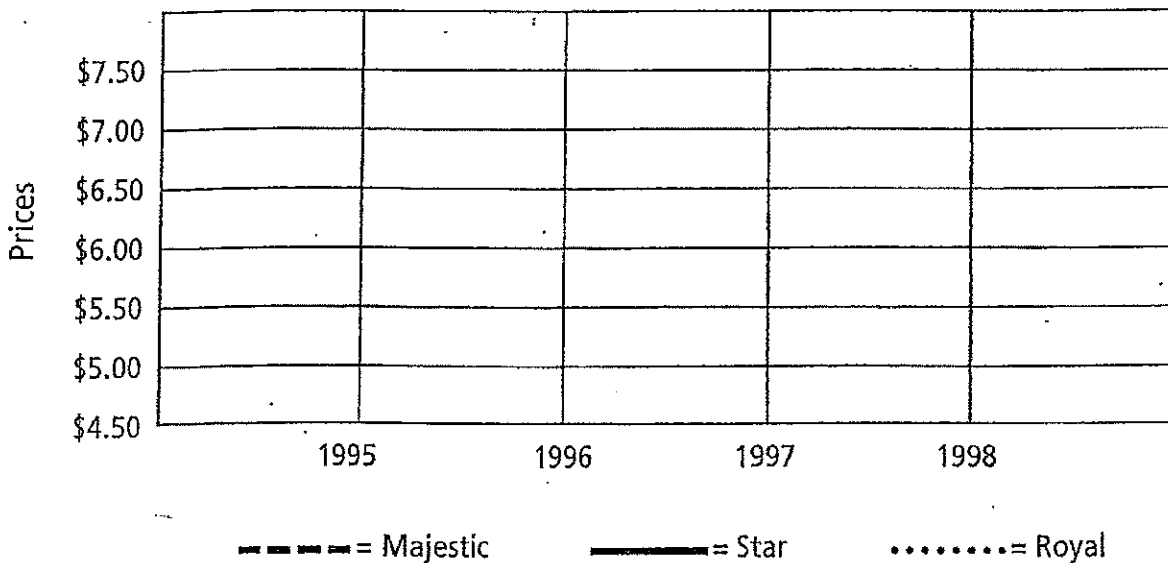ɔph using the information below to show how the prices have changed.

The Star Theater has raised its prices by 50¢ every year.

The price at the Majestic Theater is always 50¢ less than at the Royal Theater.

The Royal Theater charged $6.00 in 1995 and 1996, but raised their price by 50¢ in 1997 and $1.00 in 1998.

The Star Theater charged $4.50 in 1995.

MOViE PRiCES

Prices	1995	1996	1997	1998
$7.50				
$7.00				
$6.50				
$6.00				
$5.50				
$5.00				
$4.50				

━ ━ ━ ━ = Majestic   ━━━━━= Star   • • • • • • • •= Royal

ə the multiple line graph to answer the questions.

🖐 Which theater has the lowest prices in Garberville? _____

🖐 What was the average price in 1996? _____

🖐 If the ticket price makes up $\frac{1}{3}$ of the total cost, how much was popcorn and a soda at The Star Theater in 1995? _____

🖐 Which theater had the smallest price increase between 1995 and 1998? _____

🖐 If 500 people purchased a ticket, a small popcorn, and a small drink at The Royal Theater each day in 1997, how much did they make per day? _____
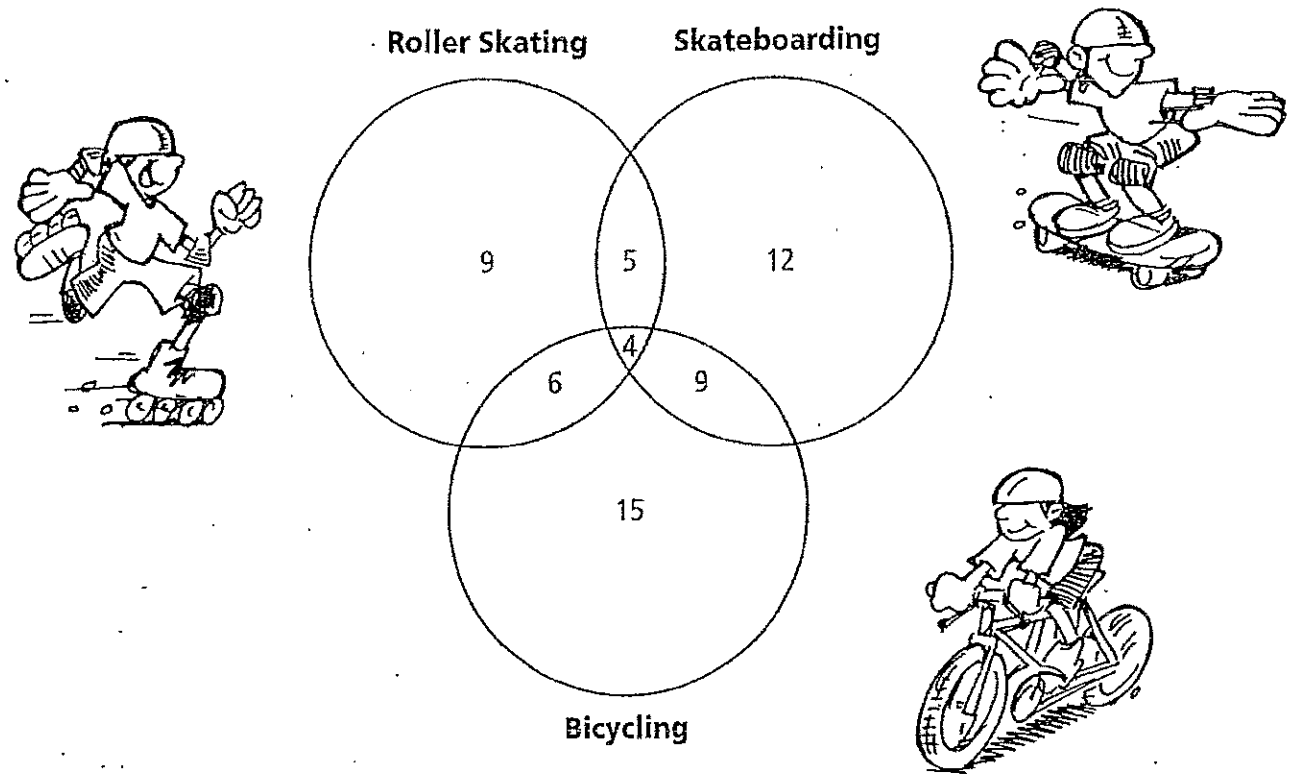
Name_____

A **Venn diagram** uses circles to show relationships between sets of data and how the information may overlap.

This Venn diagram shows the favorite types of transportation of the 60 students at Grover Jr. High.

FAVORITE TRANSPORTATION

Roller Skating   Skateboarding

9   5   12

4

6   9

15

Bicycling

Use the Venn diagram to answer the questions.

A Which is the most popular form of transportation? _____

B In all, how many students like to skateboard? _____

C How many students like all three types of transportation? _____

D What percentage of the students only like to ride bicycles? _____

E Write a fraction to show how many of the students like both roller skating and skateboarding, but not bicycling. (Show it in lowest terms.) _____

F Which is the least popular type of transportation? _____

G What percentage of students do not like to skateboard? _____

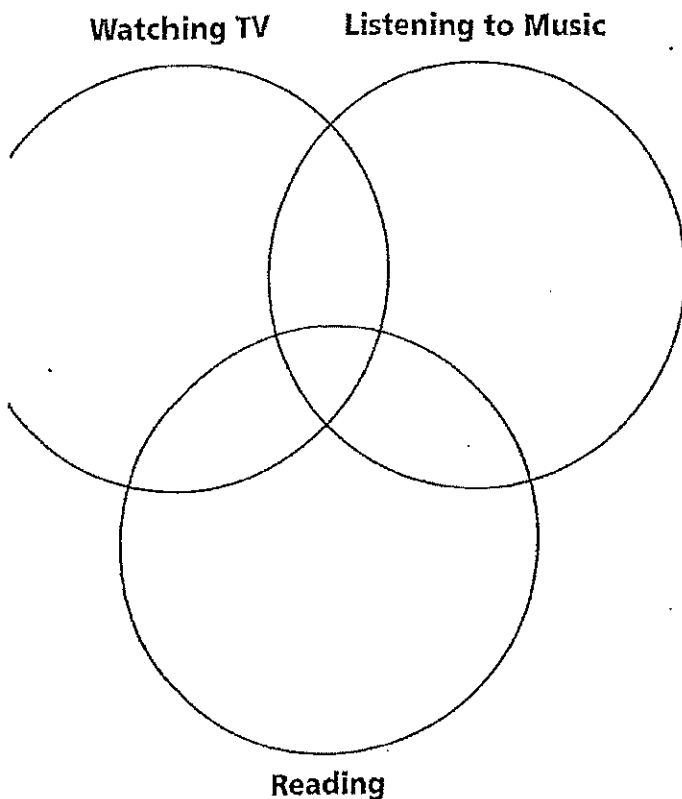**H** Which type of transportation was selected as the only choice for 15% of the students? _____

Name_____

!ate a Venn diagram using the information
ow to show the three main ways the student's
Mr. Carter's math class like to relax.

There are forty students in the class.

Seven students relax only by watching TV.

Five students enjoy both reading and listening to music.

10% of the students only listen to music, while twice that number like to watch TV and listen to music.

Three students only like to read

Six students enjoy both reading and watching TV.

The rest of the students enjoy all three ways of relaxing.

HoW STUDENTS RELAX

Watching TV   **Listening to Music**

Reading

Use the Venn diagram to answer the questions.

A. How many students only watch TV?

_____

B. How many students participated in this survey? _____

C. What percentage of students only listen to music? _____

D. Write a fraction to show how many students enjoy both reading and watching TV, but not listening to music. (Write it in lowest terms.)

_____

E. What percentage of students do not enjoy listening to music?

_____

F. What percentage of students enjoy all three ways of relaxing? (Round to the nearest percent.) _____