

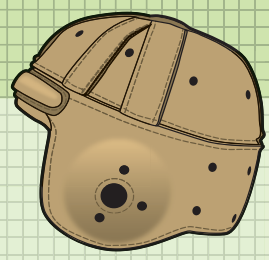
STEM IN SPORTS

People have used advances in science and math to make sports safer for athletes. Science, technology, engineering and math are known as STEM – and STEM has a big impact on every sport that's played.

Play It Safe: Helmet History

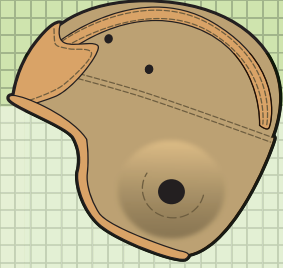
by Kid Scoop Student Reporter, Murphy Roberts

ARE YOU A KEEN OBSERVER? STEM careers require an eye for details. Read about the evolution of football helmets and answer the questions at right.



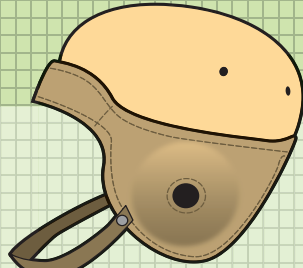
1920s

The first helmets were merely soft leather coverings that were meant primarily to protect the ears.



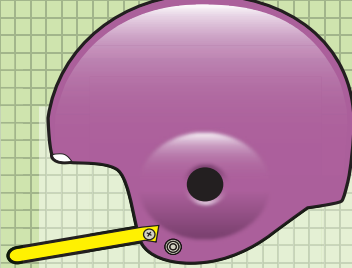
1930s

In 1939, the John T. Riddell Company of Chicago introduced the first all-plastic football helmet.



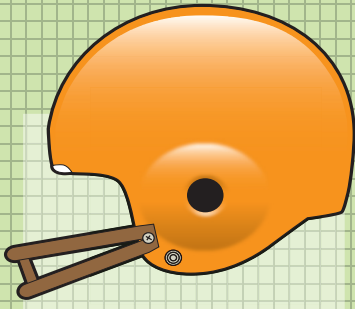
1940s

Soft leather head coverings became hard leather helmets. Chin straps and decorations were added. Helmets became mandatory for NFL players.



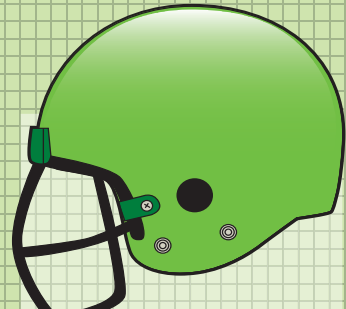
1950s

A single face bar was added to plastic helmets. In 1956, a radio helmet was introduced which allowed coaches to communicate with players on the field.



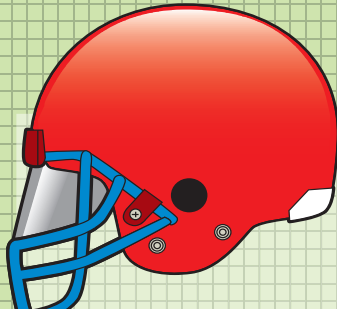
1960s

Helmets and double bar face masks were introduced. All players in the NFL wore face masks.



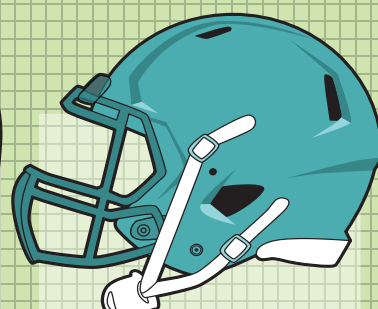
1970s

Riddell introduced a helmet with an air bladder inside the helmet to absorb energy and soften the impact of a hit on the head.



1980s - 1990s

First polycarbonate helmets and protective visors were added. In 1998, the NFL required visors to be transparent.



TODAY

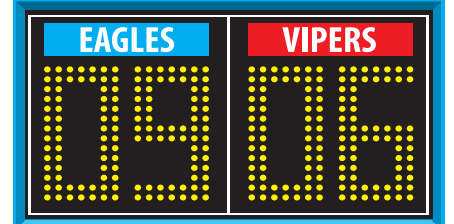
With improved face masks, cushioning against impact and chin straps, helmets are now designed to reduce concussions.

- An air bladder inside a helmet softens the impact of a hit on the head. TRUE FALSE
- The first football helmets were made of cotton. TRUE FALSE
- A radio in the helmet helps a coach communicate with players in the locker room. TRUE FALSE
- Today, the NFL requires visors to be transparent. TRUE FALSE
- The first football head coverings were designed to simply protect a player's ears. TRUE FALSE

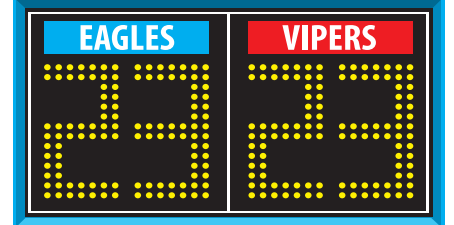
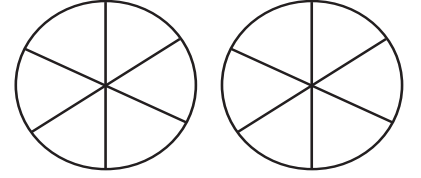
Kid Scoop Together:

FRIDAY NIGHT FOOTBALL

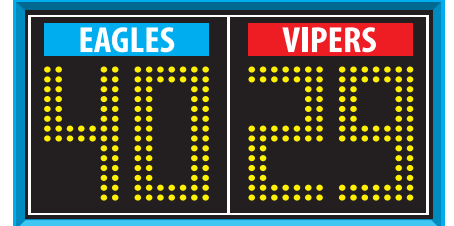
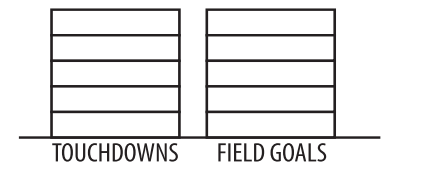
Work with a parent to solve these challenging word problems based on a high school football game.



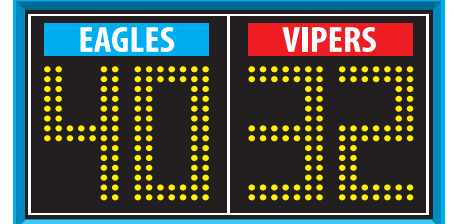
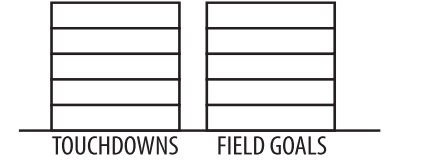
A field goal kick is worth three points. In the first quarter, each team made six field goal attempts. Color the pie chart below to show the fraction scored by each team.



At halftime, the game was tied when the Eagles scored back-to-back touchdowns worth 7 points each. Color the bar graph to show how many touchdowns vs. field goals the Eagles earned.



In the third quarter, the Eagles took the lead. Color the bar chart to show how they reached 40 points.



This was the score with two minutes left in the fourth quarter. If the Vipers are able to score another touchdown and a field goal, what would the final score of the game be?

WHO WON THE GAME?

The Number Crunchers and the Ready Readers both played their best. The score was close! Add up the numbers on the jerseys for each team. Write the winning score on the large football jersey.

| | 1ST QUARTER | 2ND QUARTER | 3RD QUARTER | 4TH QUARTER | WINNING SCORE: |
|-------------------------|-------------|-------------|-------------|-------------|----------------|
| NUMBER CRUNCHERS | 7 | 10 | 14 | 10 | |
| READY READERS | 21 | 3 | 6 | 7 | |

Standards Link: Number Sense: Calculate sums to 50.

Extra! Extra!

FOOTBALL GEOGRAPHY

Select a team that is mentioned in today's sports section. Where did the team play its most recent game? Find the location on a map. How many miles away from your home did the team play?

Standards Link: Research: Use the newspaper to locate information.

Kid Scoop Puzzler

Each football has a math problem. Draw a line from each football helmet with a math problem to the helmet with the answer.

| | | | |
|--------|--------|--------|--------|
| 17 + 3 | 21 - 7 | 31 - 6 | 10 |
| 34 | 20 | 41 - 7 | 18 + 6 |
| 14 | 19 - 9 | 24 | 25 |

Standards Link: Number Sense: Calculate sums to 50.

Double Double Word Search

- ABSORB
- HELMET
- JERSEYS
- EARS
- GAME
- HIT
- PLAYED
- PROTECT
- FACE
- RADIO
- BAR
- COACH
- HEAD
- ADD
- ROOM

Find the words in the puzzle. Then look for each word in this week's Kid Scoop stories and activities.

| | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|
| N | P | S | S | B | E | W | H | F | J |
| O | R | P | R | M | A | D | C | V | P |
| D | O | J | A | Q | D | R | A | H | T |
| E | T | G | E | A | B | F | O | E | E |
| Y | E | H | Y | R | M | A | C | A | M |
| A | C | N | O | A | S | C | T | D | L |
| L | T | S | R | D | A | E | B | I | E |
| P | B | E | W | I | J | S | Y | D | H |
| A | J | M | O | O | R | K | G | S | J |

Standards Link: Letter sequencing. Recognized identical words. Skim and scan reading. Recall spelling patterns.

FROM THE Kid Scoop LESSON LIBRARY

Football Frames

Cut out pictures of football games from the newspaper. What is not seen in the picture? Would the picture create a different feeling if they showed something that is now not seen?

Standards Link: Research: Use the newspaper to locate information.

The Atlantic and Pacific oceans had a football game. Who won?



ANSWER: They tide.

Write On!

Fastest Ever!

Write about a fast machine or a fast animal. Include three facts and one opinion.

shoppe™ Keep it local. Find local businesses. shoppelocal.biz

Cottage Grove Sentinel + shoppe Keep it local. www.shoppelocal.biz