Vocabulary
“The Day We Sent a Message to Aliens”

1. **aimlessly** (AYM-lis-lee) *adverb*; Aimlessly means “without purpose or direction.” A person might stroll aimlessly through a park, wandering around with no particular destination in mind.

2. **compilation** (kom-puh-LAY-shuhn) *noun*; The verb *compile* (kuhm-PYLE) means “to gather and put together in an orderly form.” You might compile all the research for a social studies project into a binder. A friend might compile photos of the two of you into a slideshow. A compilation is a group of similar things that have been gathered together into a collection. You might listen to a compilation of hit songs from the 1990s on a Spotify playlist. A book might contain a compilation of poems about nature.

3. **depict** (dih-PIKT) *verb*; To depict something is to show what it is like—to represent it in some way. A science fiction novel might depict life in the year 2518. Many people feel that Harry Potter movies depict Hogwarts exactly as they imagined it while reading the books. Someone who paints a portrait of a queen might depict her as strong and confident.

4. **extraterrestrial** (ek-strah-tuh-RES-tree-uhl) *adjective or noun*; The adjective *terrestrial* means “relating to Earth.” The prefix extra- means “outside” or “beyond.” Something that is extraterrestrial is from outside Earth or its atmosphere. When scientists search for life in the universe, they are looking for extraterrestrial life.

   When used as a noun, extraterrestrial refers to a being from a world other than Earth—in other words, an alien. Pao from *Rogue One: A Star Wars Story* is an extraterrestrial.

5. **invaluable** (in-VAL-yuh-buhl) *adjective*; Valuable means “having a lot of value, worth, or importance.” Something that costs a lot of money, like a gold ring, is valuable. But things can be valuable for other reasons too. A letter from your grandfather might be very valuable to you.

   The prefix in- means “no.” But invaluable does not mean “having no value.” In fact, something that is invaluable is so valuable—so useful, helpful, or important—that its worth cannot be measured. For example, if a library contains a collection of very old books that can’t be found anywhere else in the world, you might say the collection is invaluable.
6. **pore (pohr)** *verb or noun:* As it used in the article, the verb *pore* means “to read or study something very carefully.” When used this way, *pore* is usually used with *over,* as in, “To prepare for the final exam, I pored over my notes.”

As a noun, *pore* means “a tiny hole that lets liquid or gas through.” Sweat comes out of your body through the pores on the surface of your skin.

**Directions:** Below or on the back of this page, list any other words from the article whose definitions you are not sure about. For each word, use context clues to try to figure out the meaning. Then look up the word in a few different dictionaries. Discuss the primary meaning of the word with your teacher or another adult. Then write a definition for the word and one example sentence using the word.
Vocabulary Practice
“The Day We Sent a Message to Aliens”

Directions: Below are titles and summaries for imaginary books. Choose the best title for each book. Briefly explain your choices. (There’s one title you will not use.)

BOOK TITLES

A. How to Tickle a Pig and Other Invaluable Lessons
B. How Would Your Dog Depict You?
C. Living Aimlessly, With Dog
D. The Extraterrestrials in My Backpack
E. Poring Over the Past

1. You’ll love this delightful collection of “interviews,” in which dogs describe their people. Includes a questionnaire to do with your dog!

   Title (A-E): _____ Why I chose this title: _______
   ______________________________________________
   ______________________________________________

2. Allie is not excited about spending a year in Ohio on her grandparents’ farm. But what she will learn in that year will be more precious to her than all the riches in the world.

   Title (A-E): _____ Why I chose this title: _______
   ______________________________________________
   ______________________________________________

3. Jason’s parents get the shock of their lives when he brings home a family of tiny creatures who claim to be from the planet “Eos.”

   Title (A-E): _____ Why I chose this title: _______
   ______________________________________________
   ______________________________________________

4. People are always telling Paul that he needs to find “direction” and in life. He needs a “purpose,” they say. Honestly though? Paul is quite happy living without a plan, ready to discover whatever the universe has in store for him and his dog.

   Title (A-E): _____ Why I chose this title: _______
   ______________________________________________
   ______________________________________________

Directions: Underline the boldfaced word that best completes each sentence.

5. Jo’s help was invaluable/extraterrestrial—we couldn’t have finished the project without her.

6. At Sam’s graduation party, his parents played a compilation/pore of funny home videos.

7. The pirate pored/depicted over the treasure map, studying it carefully for hours.

8. Scientists learned that the strange rocks were extraterrestrial/invaluable—bits of a small meteorite that landed on Earth last year.
Constructing a Response

Directions: Read “The Day We Sent a Message to Aliens” and complete the activity on page 27. Then follow the steps below to write a response to the question on page 27.

→ See Scope’s “How to Answer a Constructed-Response Question” for tips and information about how to complete this activity.

Question from page 27:
Why is the Voyager mission significant?

Step 1: Write your claim.

Complete the sentences below to write your claim in response to the question.

The Voyager mission is significant because
____________________________________________________________________
____________________________________________________________________
____________________________________________________________________
____________________________________________________________________
____________________________________________________________________
____________________________________________________________________

Step 2: Provide text evidence with commentary.

Write two details from the article that support your claim. You can write them in the form of direct quotations or paraphrases. Include a citation for each detail. Explain how each detail supports your claim.

Detail 1:
____________________________________________________________________
____________________________________________________________________
Sentence explaining how this detail supports my claim:
____________________________________________________________________
____________________________________________________________________

Detail 2:
____________________________________________________________________
____________________________________________________________________
Sentence explaining how this detail supports my claim:
____________________________________________________________________
____________________________________________________________________
Step 3: Write a conclusion.

Wrap it all up. End your paragraph with a strong sentence that will give your readers something to think about. One option is to refer to your central claim. Or come up with an idea of your own!

___________________________________________________________________________________________________________________________________________________________________________
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Now it’s time to put it all together. And guess what? You’ve already done the hardest part! All that’s left is to take what you just wrote and put it together into one flowing paragraph. Write your final response on a separate sheet of paper.

Remember to:

• Use transitions between sentences.
• Read your paragraph to make sure your ideas are clear. Revise as needed.
• When you are satisfied with your paragraph, read it again to make sure there are no spelling or punctuation mistakes.
Short Read Quiz

Directions: Read “The Day We Sent a Message to Aliens.” Then answer the questions below.

1. On page 26, Mackenzie Carro writes “the idea of scientists sending a message to aliens might sound like science fiction.” This comparison suggests that
   A searching for extraterrestrial life is expensive.
   B communicating with aliens seems far-fetched.
   C scientists did not want to attach messages to the Voyager spacecrafts.
   D scientists got the idea for the Golden Record from a novel.

2. On page 26, Carro writes that Carl Sagan and his colleagues “pitched the idea to NASA.” Based on context clues, what is the definition of pitch as it is used here?
   A to contribute to a common task or goal
   B to set up and fix firmly in place
   C to throw an object toward a particular point
   D to propose a plan to a person or group of people to consider

3. How does the section “Floating Forever” contribute to the article?
   A It explains where the Voyagers are today.
   B It explains NASA’s role in the U.S. government.
   C It provides background information about the outer planets.
   D It explains how Sagan got the idea to send a message to extraterrestrials.

4. What was the intention behind the Golden Record’s message?
   A to celebrate the accomplishments of humanity
   B to request help collecting scientific data in deep space
   C to tell extraterrestrials about life on Earth
   D to warn extraterrestrials against invading Earth

5. Which statement can be supported by information in the article?
   A Some people think it’s time to make a new Golden Record.
   B Voyagers 1 and 2 have been successful in completing their original mission.
   C Alien civilizations are more technologically advanced than human civilization.
   D Carl Sagan is one of the most influential scientists of our time.

6. What is the main purpose of the article?
   A to convince readers to listen to the Golden Record
   B to inform readers about the history and future of a special NASA mission
   C to explain the pros and cons of space exploration
   D to entertain readers with a story about aliens

Constructed-Response Question

Directions: Write your answer in a well-organized response.

7. Write a three- to five-paragraph story in which aliens find the Golden Record. Include information about the Golden Record from “The Day We Sent a Message to Aliens” in your story.
Short Read Quiz

Directions: Read “The Day We Sent a Message to Aliens.” Then answer the questions below.

1. On page 26, Mackenzie Carro writes “the idea of scientists sending a message to aliens might sound like science fiction.” She means that sending a message to aliens might sound
   A) expensive.
   B) unlikely to happen.
   C) risky.
   D) pointless.

2. On page 26, Carro writes that Carl Sagan and his colleagues “pitched the idea to NASA.” As used here, pitched most closely means
   A) thrown.
   B) set up.
   C) contributed.
   D) suggested.

3. The section “Floating Forever” explains
   A) where the Voyagers are today.
   B) NASA’s role in the government.
   C) how the Golden Record was made.
   D) how Sagan got the idea to send a message to aliens.

4. The Golden Record was created to
   A) collect data about aliens.
   B) protect humans from aliens.
   C) tell aliens about life on Earth.
   D) send a warning to aliens.

5. Which statement can be supported by information in the article?
   A) Some people think it’s time to make a new Golden Record.
   B) Voyagers 1 and 2 collected useful information about outer planets in Earth’s solar system.
   C) Aliens are smarter than humans.
   D) Carl Sagan is one of the top scientists of all time.

6. The main purpose of the article is to
   A) convince readers to listen to the Golden Record.
   B) inform readers about the history and future of a special NASA mission.
   C) explain the pros and cons of space exploration.
   D) entertain readers with a story about aliens.

Constructed-Response Question

Directions: Write your answer in a well-organized response.

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