## Diversity: Languages Spoken in the United States

## Topic(s):

Diversity, languages, data collection, census

## Grade Level:

5-6

## Approx. Time Required: 45 minutes

## Learning Objectives:

Students will be able to:

- Calculate percentages based on data provided.
- Reason abstractly and quantitatively based on data.
- Draw conclusions based on information shared in a discussion.
- Build vocabulary.
- Understand and explain the term "diversity."
- Understand the importance of the decennial census and how it tells them important information about people in their state.


## Introduction

The 2020 Census Statistics in Schools (SIS) program is designed to educate students about the decennial census and to teach them educational concepts and skills, such as data literacy, through use of census data in the classroom. Responding to the census helps your community get its fair share of funding. Census data guides how more than $\$ 675$ billion in federal funding is distributed to states and communities each year. These funds support vital community programs that help children, such as schools, hospitals, housing, and food assistance. By educating students about the 2020 Census, you can help encourage a complete count.

The 2020 Census SIS program can be used with educational standards across the United States. You can use the topics and learning objectives above to determine which subject and unit plan or theme this activity will best fit into.

## About the $\mathbf{2 0 2 0}$ Census

In addition to the information that is built into instructions for this activity, the following points provide an easy, grade-appropriate way to explain the census to your students.

- The decennial census is a count of every person living in the United States that occurs every 10 years.
- Responses to the census determine how $\$ 675$ billion is given to states and communities to support things like schools, hospitals, housing, and parks.
- It is important that every person be counted so that the government knows where resources are most needed.
- You can do your part by making sure an adult in your home counts you-and every person living in your homein the 2020 Census.


## About the Modifications

- This activity is a modified version of the 2020 SIS activity Diversity: Languages Spoken in the United States for fifth and sixth grade classrooms. It has been modified to accommodate K-12 English language learners (ELLs).
- Sections have been added to this teaching guide that call out modifications made specifically for ELLs.


## Materials Required

- Printed ELL student worksheets
- Calculators for each student
- A board or chart paper to record student answers
- A computer and projector (optional)


## Worksheet Description

Students will learn how communities thrive with a broad diversity of residents. The worksheet focuses on simple data points that show the distribution of people who speak only English at home and people who speak a language other than English at home throughout their state and country. Students will learn how demographic information and trends affect their local community.

## Before the Activity-10 Minutes

For ELLs: Before the lesson, when you hand out student worksheets and activity items to all students, hand out the Word Bank and Vocabulary to English language learners as well. Introduce the key vocabulary to your students. Use your discretion in choosing which concepts are already understood and which require previewing. Direct students to the word bank and vocabulary to follow along and view images.

## Key Vocabulary for ELLs:

- Census: A process of counting all the people in a country, city, or town and collecting information about them
- Questionnaire: A set of written questions that is given to people to collect facts or opinions about something
- Diversity: The ways people are different from one another
- Percentage: A number that shows a part of a group
- Data: Facts usually represented by numbers
- Population: The number of people who live in an area

Note for ELLs: During discussions, encourage students to use the word bank in their worksheet to find words to support them in their oral answers. Provide sentence starters on the board for students, as needed, to help them answer questions.

1. Begin by telling students that today the class will be learning about diversity in the United States. Share with students that diversity means being composed of different elements. Essentially, it's another word for "difference." Hand out student worksheets, one per student. Ask students to raise their hands and share ideas about how their class is diverse (race, ethnicity, religion, family size, hair color, boys vs. girls, etc.). Record these ideas on the front board.
2. Then ask, "Why is it good for our class that we are diverse? How does diversity make us stronger?" Lead a discussion on these questions. After this classroom discussion, ask students to record their answer to Question \#1 on their student worksheet.

## During the Activity-30 Minutes

1. Explain to the class that today they will also learn about the census, which counts every person living in the United States every 10 years. The data the census collects tells us the number of people that live in our communities and can be used to identify different types of diversity throughout the country.
2. Students will now analyze data over time that represents the number of people in the United States who speak English at home compared with the number of people who speak a language other than English at home. Explain to students that language is one way in which our country is diverse. Tell students that they will be looking at language data for the whole country in 2010 and 2017, then their state and two other states in 2017.
3. Instruct students to complete the first table in their student worksheet. If students need assistance with calculating percentages, demonstrate on the front board how to calculate a percentage ("speak a language other than English at home" population / total population, then move the decimal two spots to the right). As an alternative to calculating percentages, the teacher can provide them with the calculations from the table below.

For ELLs: While non-English language learners are working on calculations, talk through the table and explain the headers and content to English language learners. Ensure that students understand that the number of people who speak a language other than English at home increased from 2010 to 2017.

| Area and year | Total population 5 <br> years and older | Speak only English <br> at home (number of <br> people) | Speak a language <br> other than English <br> at home (number of <br> people) | Speak only English <br> at home (\% of <br> population) | Speak a language <br> other than English <br> at home (\% of <br> population) |
| ---: | ---: | ---: | ---: | ---: | ---: |
| U.S., 2010 | $289,215,746$ | $229,673,150$ | $59,542,596$ | $\mathbf{7 9 . 4 \%}$ | $20.6 \%$ |
| U.S., 2017 | $305,924,019$ | $239,331,713$ | $66,592,306$ | $\mathbf{7 8 . 2 \%}$ | $21.8 \%$ |

Source: U.S. Census Bureau, 2010 American Community Survey 1-Year Estimates and 2017 American Community Survey 1-Year Estimates 2010: https://data.census.gov/cedsci/table?q=B16001\&hidePreview=false\&tid=ACSDT1Y2010.B16001\&vintage=2018 2017: https://data.census.gov/cedsci/table?q=B16001\&hidePreview=false\&tid=ACSDT1Y2017.B16001\&vintage=2018
4. Next, direct students to write in your state in the second data table and, as a class, select two other states in different parts of the country to use for this activity. Ask students to predict the percentage of people who speak a language other than English at home for your state and for the two other states. Have them write this information in the first column of the second data table.
5. Using Activity Item: Language Spoken at Home by State, students will search for each state's data and complete the second data table. If you prefer to have students search for the data online, access it through data.census.gov (https://data.census.gov/cedsci/table? $q=B 16001 \& g=0100000 U S .04000 .001 \& t i d=A C S D T 5 Y 2017 . B 16001 \&$ hidePreview=true).

For ELLs: Depending on the amount of time you have available for the lesson, you may also do this portion of the activity as a small group or as a class. While non-English language learners are working on calculations, talk through the table and explain the headers and content to English language learners. For example, the word "prediction" may need to be explained to ELL students.

| Area and year | Prediction: Speak a language <br> other than English at home | Speak a language other than <br> English at home (number of <br> people) | Speak a language other <br> than English at home (\% of <br> population) |
| :--- | :--- | :--- | :--- |
| My State, 2017 |  |  |  |
| State 1: |  |  |  |
| State 2: |  |  |  |

6. Tell students to answer Questions \#5 through \#7 individually.

## After the Activity-5 Minutes

Facilitate a classroom discussion by reviewing Questions \#5 through \#7 on the student worksheet.
Question \#5: How close were your predictions to each state's true percentage of people who speak a language other than English at home? Were you surprised by any of them?

For ELLs: Use the sentence starter, "My prediction was $\qquad$ . This did / did not surprise me because $\qquad$ ."

Answers will vary, but students may be surprised at the large percentage of people who speak another language other than English at home in Illinois because it's not a border state or typically known for immigration.

Question \#6: Which states across the country do you think would have the highest percentage of people who speak a language other than English at home? Why?

For ELLs: Use the sentence starter, "I think the states that have the largest percentage of people who speak a language other than English at home are $\qquad$ ."

Answers will vary, but students may think that states along the southern border have a higher percentage of people who speak a language other than English at home, such as Florida, Texas, or California.

Question \#7: Why is it important that the U.S. Census Bureau collect this type of data? How could knowing more about the percentage of our population that speaks a language other than English at home affect decisions made by our national and local governments?

For ELLs: Use the sentence starter, "It's important to collect this data because $\qquad$ ."

Answers will vary but should include something about the country's growing diversity. Answers may also speak about how governments and organizations likely need to start producing materials in multiple languages to make information accessible to all people.

For ELLs: If communities know how many people speak a language other than English, they can provide funding for ELL classes for students who are learning English.

Note for ELLs: If students do not come up with all of these answers, be sure to emphasize the impact that Census Bureau data about languages spoken in the U.S. has on the communities that serve these populations.

## Home Extension

Teachers, please read the instructions for the students' homework assignment out loud to the class:
Take your student worksheet home and share it with an adult in your home. Ask them if they can guess the percentage of people who speak a language other than English at home in your state. Verify their answer with the data you learned in class.

## Activity Item: Language Spoken at Home by State

| Geography | Estimate Language Spoken at Home Population 5 years and over - English only | Percent Language Spoken at Home Population 5 years and over - English only | Estimate Language Spoken at Home Population 5 years and over - Language other than English | Percent Language Spoken at Home Population 5 years and over - Language other than English |
| :---: | :---: | :---: | :---: | :---: |
| Alabama | 4,324,223 | 94.9 | 234,385 | 5.1 |
| Alaska | 574,744 | 84 | 109,554 | 16 |
| Arizona | 4,654,602 | 73 | 1,720,587 | 27 |
| Arkansas | 258,5911 | 92.8 | 201,889 | 7.2 |
| California | 20,418,288 | 56 | 16,071,014 | 44 |
| Colorado | 4,237,632 | 83.1 | 864,637 | 16.9 |
| Connecticut | 2,656,081 | 77.9 | 752,209 | 22.1 |
| Delaware | 774,288 | 87.2 | 114,162 | 12.8 |
| District of Columbia | 518,706 | 82.5 | 110,078 | 17.5 |
| Florida | 13,669,654 | 71.3 | 5,503,431 | 28.7 |
| Georgia | 8,220,677 | 86.1 | 1,323,530 | 13.9 |
| Hawaii | 986,478 | 74.2 | 343,763 | 25.8 |
| Idaho | 1,377,849 | 89.3 | 165,414 | 10.7 |
| Illinois | 9,312,735 | 77.2 | 2,756,231 | 22.8 |
| Indiana | 5,672,618 | 91.6 | 523,471 | 8.4 |
| lowa | 2,698,198 | 92.4 | 223,419 | 7.6 |
| Kansas | 2,396,123 | 88.5 | 310,871 | 11.5 |
| Kentucky | 3,929,849 | 94.7 | 220,387 | 5.3 |
| Louisiana | 3,991,873 | 91.7 | 361,157 | 8.3 |
| Maine | 1,186,749 | 93.8 | 79,015 | 6.2 |
| Maryland | 4,613,252 | 82 | 1,016,077 | 18 |
| Massachusetts | 4,940,967 | 76.9 | 1,485,497 | 23.1 |
| Michigan | 8,476,289 | 90.6 | 877,280 | 9.4 |
| Minnesota | 4,557,386 | 88.7 | 583,378 | 11.3 |
| Mississippi | 2,686,128 | 96.1 | 109,237 | 3.9 |
| Missouri | 5,358,633 | 94 | 343,526 | 6 |

Activity Item: Language Spoken at Home by State (Cont.)

| Geography | Estimate Language Spoken at Home Population 5 years and over - English only | Percent Language Spoken at Home Population 5 years and over - English only | Estimate Language Spoken at Home Population 5 years and over - Language other than English | Percent Language Spoken at Home Population 5 years and over - Language other than English |
| :---: | :---: | :---: | :---: | :---: |
| Montana | 930,797 | 96.1 | 37,847 | 3.9 |
| Nebraska | 1,566,040 | 88.8 | 197,054 | 11.2 |
| Nevada | 1,881,829 | 69.5 | 824,689 | 30.5 |
| New Hampshire | 1,168,119 | 92.2 | 99,496 | 7.8 |
| New Jersey | 5,821,459 | 69 | 2,611,986 | 31 |
| New Mexico | 1,269,225 | 65 | 684,541 | 35 |
| New York | 12,924,635 | 69.4 | 5,696,716 | 30.6 |
| North Carolina | 8,369,406 | 88.6 | 1,079,175 | 11.4 |
| North Dakota | 654,693 | 94.4 | 39,016 | 5.6 |
| Ohio | 10,163,386 | 93.1 | 750,666 | 6.9 |
| Oklahoma | 3,264,424 | 89.9 | 366,714 | 10.1 |
| Oregon | 3,214,945 | 84.8 | 578,328 | 15.2 |
| Pennsylvania | 10,750,803 | 89 | 1,328,055 | 11 |
| Rhode Island | 780,740 | 78 | 220,827 | 22 |
| South Carolina | 4,283,646 | 93.1 | 319,834 | 6.9 |
| South Dakota | 744,104 | 93.6 | 51,128 | 6.4 |
| Tennessee | 5,762,777 | 93 | 432,026 | 7 |
| Texas | 16,455,855 | 64.7 | 8,981,907 | 35.3 |
| Utah | 2,334,994 | 85.2 | 404,933 | 14.8 |
| Vermont | 561,646 | 94.4 | 33,161 | 5.6 |
| Virginia | 6,613,662 | 84.2 | 1,242,368 | 15.8 |
| Washington | 5,438,146 | 80.9 | 1,283,676 | 19.1 |
| West Virginia | 1,693,131 | 97.5 | 42,667 | 2.5 |
| Wisconsin | 4,955,244 | 91.3 | 470,501 | 8.7 |
| Wyoming | 506,060 | 92.7 | 39,683 | 7.3 |

Source: U.S. Census Bureau, 2013-2017 American Community Survey 5-Year Estimates
https://data.census.gov/cedsci/table?
$q=B 16001 \& g=0100000 \cup S .04000 .001 \& t i d=A C S D T 5 Y 2017 . B 16001 \& h i d e P r e v i e w=t r u e$

