

Children's Internet Access at Home

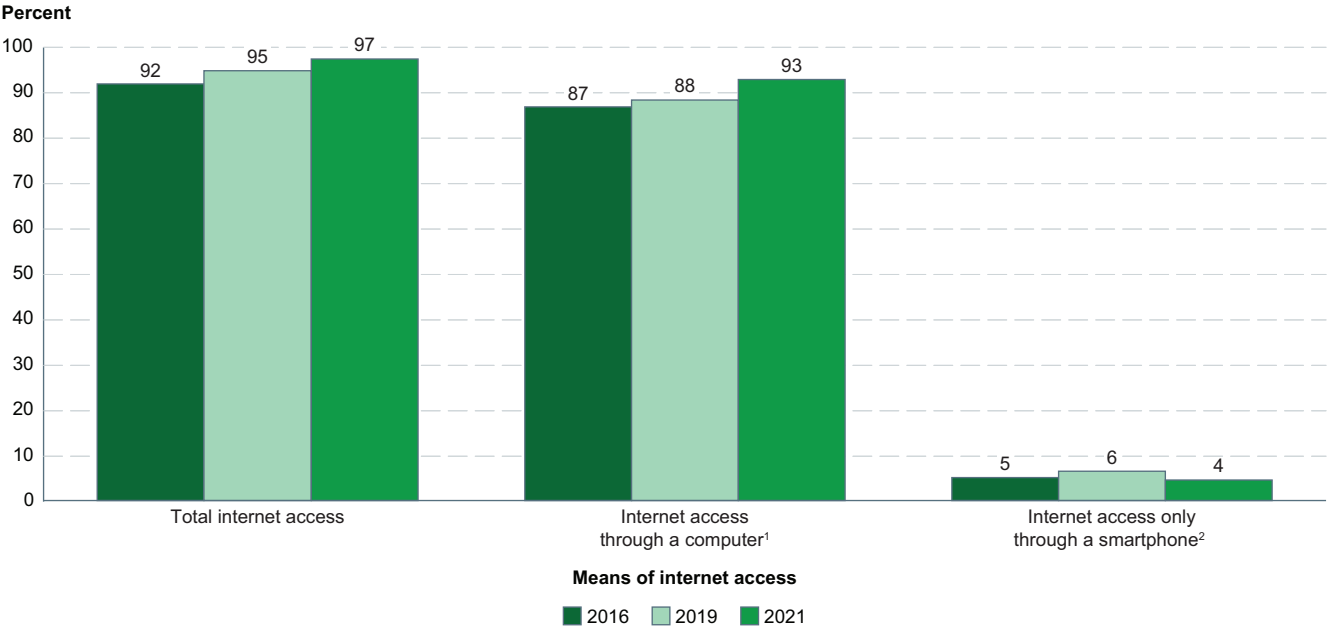
In 2021, the percentage of 3- to 18-year-olds who had home internet access through a computer was highest for those whose parents had attained a bachelor's or higher degree (98 percent) and lowest for those whose parents had attained less than a high school credential (78 percent).

This indicator uses data from the American Community Survey (ACS) to describe the percentage of 3- to 18-year-olds with home internet access as well as the percentages with home internet access through a computer and only through a smartphone. Drawing data from the Current Population Survey (CPS), this indicator also examines the main reasons reported for not having home internet access.

In 2021, some 97 percent of 3- to 18-year-olds had home internet access, according to the American

Community Survey (ACS). Specifically, 93 percent had access through a computer,¹ and 4 percent relied on a smartphone for home internet access.² The remaining 3 percent had no internet access at home. When compared with the percentage with home internet access overall, there was more variation by race/ethnicity, parental education, and household income in the percentage of 3- to 18-year-olds who had access to the internet through a computer.

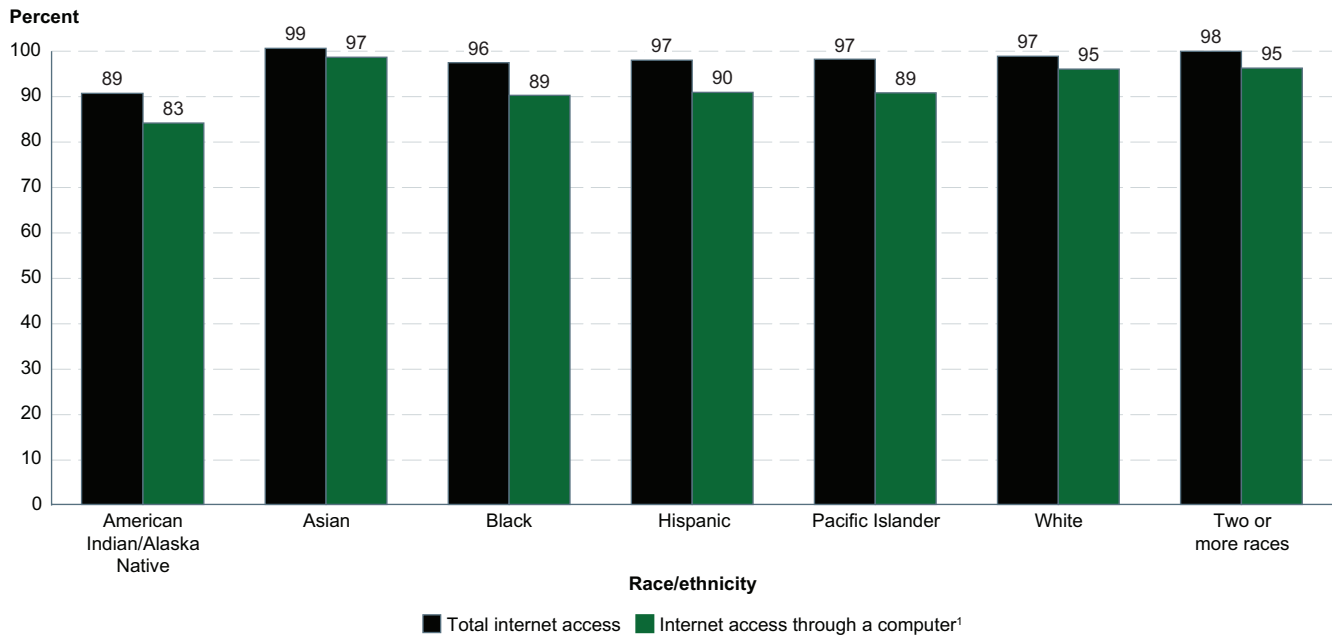
Figure 1. Percentage of 3- to 18-year-olds who had home internet access, by whether they had access through a computer or only through a smartphone: 2016, 2019, and 2021



¹ Includes children in homes with both internet access and one or more of the following types of computer: desktop or laptop, tablet or other portable wireless computer, or “some other type of computer.” Excludes children in homes having none of these types of computers. Includes children in homes having both smartphones and any of these types of computers.
² Includes children in homes with both internet access and smartphones, but with none of the computer types (desktop or laptop, tablet, or other) listed in footnote 1.
NOTE: Includes only 3- to 18-year-olds living in households (respondents living in group quarters such as shelters, healthcare facilities, or correctional facilities were not asked about internet access). Detail may not sum to totals due to rounding.
SOURCE: U.S. Department of Commerce, Census Bureau, American Community Survey (ACS), 2016, 2019, and 2021. See *Digest of Education Statistics 2020*, table 702.12 and *Digest of Education Statistics 2022*, table 702.12.

The percentage of 3- to 18-year-olds with home internet access was higher in 2021 (97 percent) than in 2016 (92 percent), the first year in which data on home internet access through smartphones were collected by the ACS. Similarly, the overall percentage with home internet access was higher in 2021 than in 2019 (95 percent), prior to the coronavirus pandemic. More specifically,

- the percentage with home internet access through a computer was higher in 2021 (93 percent) than in 2016 (87 percent) and in 2019 (88 percent); and
- the percentage that relied on a smartphone for home internet access was lower in 2021 (4 percent) than in 2016 (5 percent) and in 2019 (6 percent).

Figure 2. Percentage of 3- to 18-year-olds who had home internet access and who had internet access through a computer, by child's race/ethnicity: 2021

¹ Includes children in homes with both internet access and one or more of the following types of computer: desktop or laptop, tablet or other portable wireless computer, or "some other type of computer." Excludes children in homes having none of these types of computers. Includes children in homes having both smartphones and any of these types of computers.

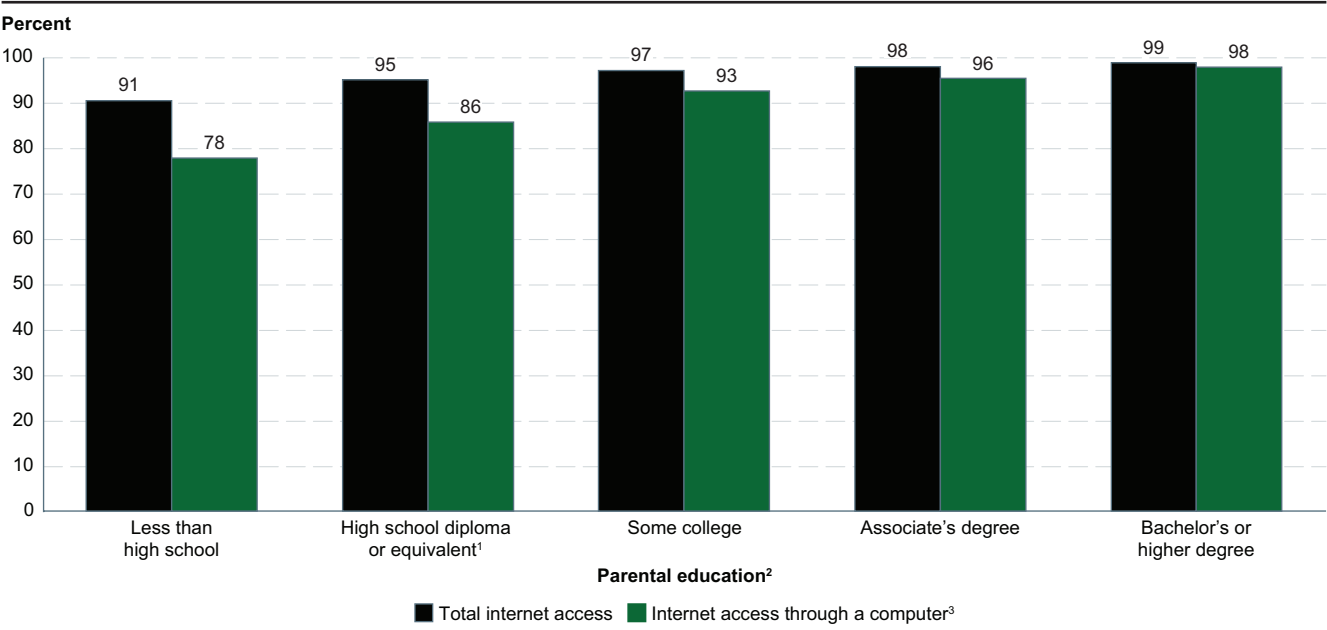
NOTE: Includes only 3- to 18-year-olds living in households (respondents living in group quarters such as shelters, healthcare facilities, or correctional facilities were not asked about internet access). Race categories exclude persons of Hispanic ethnicity. Although rounded numbers are displayed, the figures are based on unrounded data. SOURCE: U.S. Department of Commerce, Census Bureau, American Community Survey (ACS), 2021. See *Digest of Education Statistics 2022*, table 702.12.

The percentage of 3- to 18-year-olds with home internet access varied across racial/ethnic groups. In 2021, the percentage with home internet access was highest for those who were Asian and lowest for those who were American Indian/Alaska Native. Specifically, the percentage with home internet access was

- 99 percent for Asian children;
- 98 percent for children of Two or more races;
- 97 percent for Hispanic, Pacific Islander, and White children;
- 96 percent for Black children; and
- 89 percent for American Indian/Alaska Native children.

A similar pattern by race/ethnicity was observed for internet access through a computer. The percentage with home internet access through a computer was highest for 3- to 18-year-olds who were Asian (97 percent) and lowest for those who were American Indian/Alaska Native (83 percent).

Figure 3. Percentage of 3- to 18-year-olds who had home internet access and who had internet access through a computer, by parental education: 2021



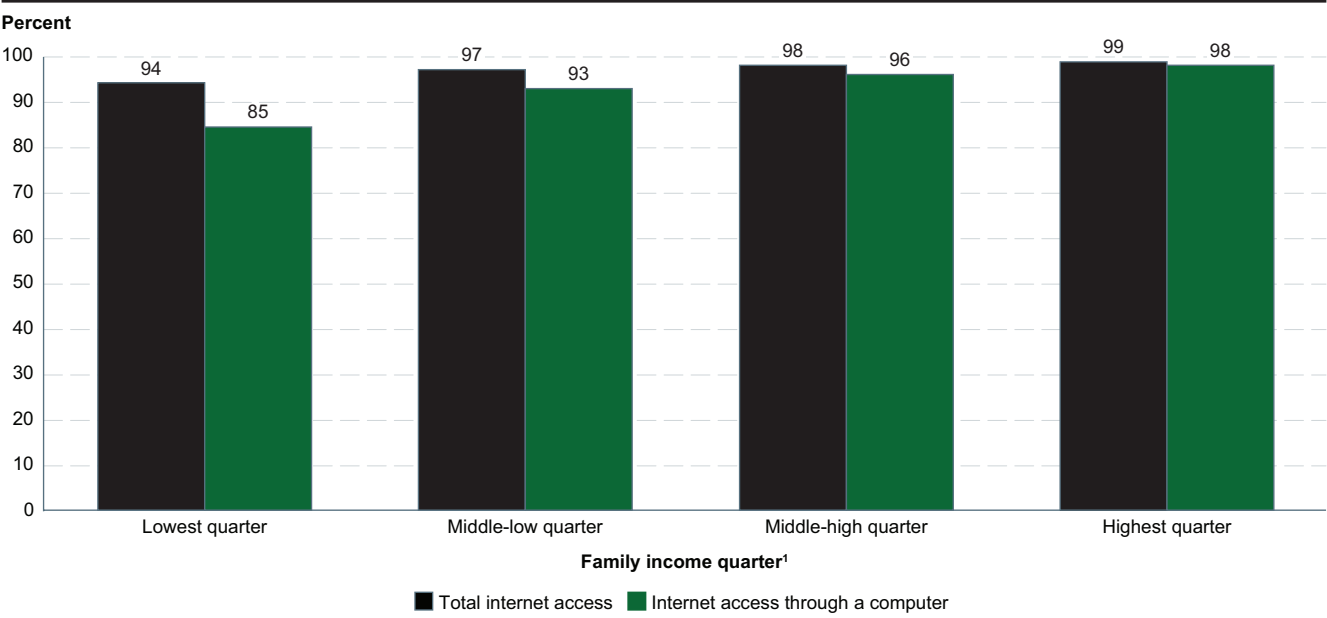
¹ Includes those who completed high school through equivalency credentials, such as the GED.
² Highest education level of any parent residing with the 3- to 18-year-old (including an adoptive or stepparent).
³ Includes children in homes with both internet access and one or more of the following types of computer: desktop or laptop, tablet or other portable wireless computer, or "some other type of computer." Excludes children in homes having none of these types of computers. Includes children in homes having both smartphones and any of these types of computers.
NOTE: Includes only 3- to 18-year-olds living in households (respondents living in group quarters such as shelters, healthcare facilities, or correctional facilities were not asked about internet access) who were related to the householder and who resided with at least one of their parents. The householder is the person (or one of the people) who owns or rents (maintains) the housing unit. Although rounded numbers are displayed, the figures are based on unrounded data.
SOURCE: U.S. Department of Commerce, Census Bureau, American Community Survey (ACS), 2021. See *Digest of Education Statistics 2022*, table 702.12.

Overall, the higher the level of parental educational attainment, the higher the percentage of 3- to 18-year-olds with home internet access, ranging from 91 percent for those whose parents had attained less than a high school credential to 99 percent for those whose parents had attained a bachelor’s or higher degree. Similarly, the higher the level of parental educational attainment, the higher the percentage of 3- to 18-year-olds with home internet access through a computer. Specifically, in 2021,

the percentage with home internet access through a computer was

- 98 percent for those whose parents had attained a bachelor’s or higher degree;
- 96 percent for those whose parents had attained an associate’s degree;
- 93 percent for those whose parents had attained some college;
- 86 percent for those whose parents had a high school credential;³ and
- 78 percent for those whose parents had attained less than a high school credential.

Figure 4. Percentage of 3- to 18-year-olds who had home internet access and who had internet access through a computer, by family income quarter: 2021



¹ Includes only children living in households where at least one of the household members is related to the householder. Family income is based on the income of the householder's family and not necessarily the child's own family if the child is not related to the householder. The lowest quarter refers to the bottom 25 percent of all family incomes; the middle-low quarter refers to the 26th through the 50th percentile of all family incomes; the middle-high quarter refers to the 51st through the 75th percentile of all family incomes; and the highest quarter refers to the top 25 percent of all family incomes.

NOTE: Includes only 3- to 18-year-olds living in households (respondents living in group quarters such as shelters, healthcare facilities, or correctional facilities were not asked about internet access). Those who are 3- to 18-year-olds with internet access through a computer are those in homes with both internet access and one or more of the following types of computer: desktop or laptop, tablet or other portable wireless computer, or "some other type of computer." Excludes children in homes having none of these types of computers. Includes children in homes having both smartphones and any of these types of computers. Although rounded numbers are displayed, the figures are based on unrounded data.

SOURCE: U.S. Department of Commerce, Census Bureau, American Community Survey (ACS), 2021. See *Digest of Education Statistics 2022*, table 702.12.

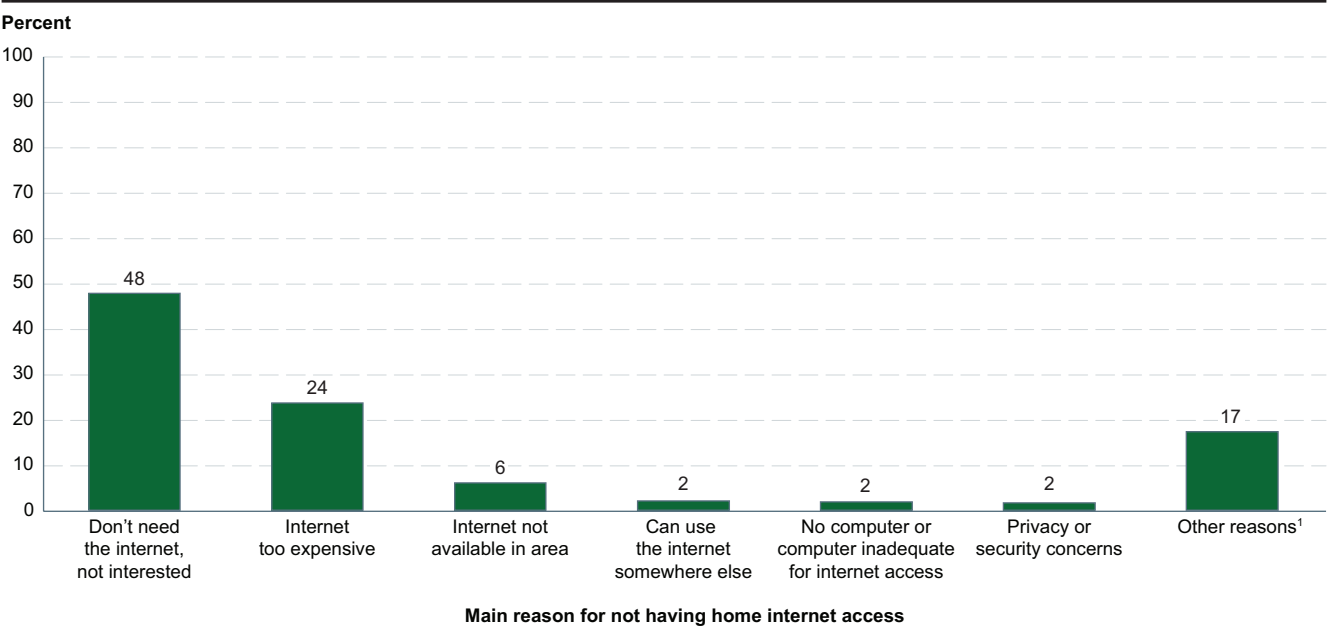
Similar to the pattern seen for parental education, the higher the level of family income, the higher the percentage of 3- to 18-year-olds with home internet access. Specifically, in 2021, the percentage with home internet access was highest for those in families in the highest income quarter (99 percent), followed by those in the middle-high quarter (98 percent), the middle-low quarter (97 percent), and the lowest quarter (94 percent).

The same patterns by family income were observed for internet access through a computer. Specifically, in 2021, the percentage with home internet access through a computer was highest for those in families in the highest

income quarter (98 percent), followed by those in the middle-high quarter (96 percent), the middle-low quarter (93 percent), and the lowest quarter (85 percent).

These findings on race/ethnicity, parental education, and household income reveal that there was more variation in internet access through a computer than there was in internet access overall. Specifically, when examined by race/ethnicity, parental education, and household income, the gap between the highest and lowest group in the percentage of 3- to 18-year-olds who had access to the internet through a computer was larger than the corresponding gap with overall internet access.

Figure 5. Percentage distribution of 3- to 18-year-olds who had no internet access at home, by main reason for not having access: 2021



¹ Respondents could specify “other” reasons. Examples of other reasons were not provided to respondents.
NOTE: Data are based on sample surveys of the civilian noninstitutionalized population, which excludes persons in the military and persons living in institutions (e.g., prisons or nursing facilities). Includes only 3- to 18-year-olds living in homes with no internet access, which is estimated to be 12 percent of this age group by the 2021 Current Population Survey. Although rounded numbers are displayed, the figures are based on unrounded data. Detail may not sum to totals due to rounding.
SOURCE: U.S. Department of Commerce, Census Bureau, Current Population Survey (CPS), November 2021. See *Digest of Education Statistics 2022*, table 702.40.

To understand the barriers to more universal internet access, the Current Population Survey (CPS)⁴ asked householders what their household’s main reason was for not having access to the internet. In 2021, the two most commonly cited main reasons that 3- to 18-year-olds did not have home internet access were

- household members did not need it or were not interested in having it (48 percent); and
- it was too expensive (24 percent).

Other main reasons cited for not having home internet access included the following:

- internet service was not available in the area (6 percent);
- household members could use the internet somewhere else (2 percent);
- the home either had no computer or had a computer that was inadequate for internet use (2 percent); and
- privacy or security concerns (2 percent).⁵

In 2021, among 3- to 18-year-olds who had no internet access at home, the percentages whose main barrier to home internet access was that it was too expensive were lower

- for those who were White (18 percent) than for their peers who were Black (30 percent) and those of Two or more races (35 percent);
- for those whose parents had attained a bachelor’s or higher degree (14 percent) than for those whose parents had an associate’s degree (25 percent), a high school credential (34 percent), and less than a high school credential (33 percent);
- for those whose parents had some college education (20 percent) than for those whose parents had a high school credential and those whose parents had less than a high school credential; and
- for those with family income levels of \$40,000 or more (ranging from 10 to 15 percent)⁶ than for those with family income levels of less than \$40,000 (ranging from 29 to 47 percent).⁷

Endnotes:

- ¹ Refers to the percentage of 3- to 18-year-olds with home internet access through one or more of the following types of computers: desktop or laptop, tablet or other portable wireless computer, or “some other type of computer.” Includes children in homes having both smartphones and any of these types of computers.
- ² Refers to the percentage of 3- to 18-year-olds who had home internet access only through a smartphone but did not have any of the types of computers listed in endnote 1.
- ³ Includes those who completed high school through equivalency credentials, such as the GED.
- ⁴ Data from the CPS differ from data from the ACS because the ACS asked respondents about internet *access* and explicitly

indicated that having a cell phone service is considered having internet access, while the CPS asked about internet *use* and made no explicit reference to having a cell phone service. This survey difference may provide some explanation for why the two datasets reported different percentages of 3- to 18-year-olds who “did not have access to the Internet” (3 percent in ACS and 12 percent in CPS in 2021).

⁵ About 17 percent of families answered “other reasons.”

⁶ These income levels are “\$40,000 to \$49,999,” “\$50,000 to \$74,999,” “\$75,000 to \$99,999,” and “\$100,000 or more.”

⁷ These income levels are “less than \$10,000,” “\$10,000 to \$19,999,” “\$20,000 to \$29,999,” and “\$30,000 to \$39,999.”

Reference tables: *Digest of Education Statistics 2022*, tables 702.12 and 702.40; *Digest of Education Statistics 2020*, table 702.12

Related indicators and resources: *Rural Students’ Access to the Internet*; *Student Access to Digital Learning Resources Outside of the Classroom*; *Technology and Engineering Literacy*

Glossary: Bachelor’s degree; College; Educational attainment; Educational attainment (Current Population Survey); Gap; High school completer; Racial/ethnic group