Chapter 4. Priority Populations

Many Americans enjoy easy access to one of the world's finest health care delivery systems. However, as demonstrated in previous NHDRs, some Americans do not have full access to the best quality health care.

To examine the issue of disparities in health care, Congress directed AHRQ to produce an annual report to track "prevailing disparities in health care delivery as it relates to racial factors and socioeconomic factors in priority populations." Although the emphasis is on disparities related to race, ethnicity, and socioeconomic status, this directive includes a charge to examine disparities in "priority populations"—groups with unique health care needs or issues that require special attention.

This chapter addresses the congressional directive on priority populations. Chapters 2 and 3 of this report examine racial, ethnic, and socioeconomic differences in quality of health care and access to health care in the general U.S. population; this chapter focuses on differences within and across priority populations. For example, comparisons are made between Black and White women and between children from low and high income families. This approach may help policymakers to understand the impact of racial, ethnic, and socioeconomic differences on specific populations and target quality improvement programs toward groups in greatest need. Appendix D includes detailed tables that allow examination of racial, ethnic, and socioeconomic disparities both in the general population and across priority populations for most measures.

AHRQ's Priority Populations

AHRQ's priority populations, specified by Congress in the Healthcare Research and Quality Act of 1999 (Public Law 106-129), are:

- Minority groups
- Low income groups
- Women
- Children
- Elderly
- Individuals with special health care needs, including individuals with disabilities and individuals who need chronic care or end-of-life health care.

In addition, this legislation directs AHRQ to examine health care delivery in rural areas. Hence, this chapter addresses each of these priority populations as well as residents of rural areas.

How This Chapter Is Organized

This chapter presents new information about disparities in quality of and access to health care in priority populations. It is presented in the following order:

- Racial and ethnic minorities
- Low income groups
- Women
- Children
- Elderly
- Residents of rural areas
- Individuals with special health care needs

To avoid repetition of findings from previous chapters on race, ethnicity, and socioeconomic status, the first two sections summarize quality of and access to health care for racial and ethnic minorities and low income groups.

Subsequent sections focus on the remaining priority populations and examine disparities in care within each population group and changes in disparities over time. To present this greater detail, these sections highlight a small number of measures. Measures for each priority population were selected with the assistance of members of the Interagency Work Group and AHRQ experts for particular populations. For smaller priority populations, measure selection was often driven by available sample sizes. When possible, measures were selected to encompass multiple components of health care need, such as preventive services, treatment of acute illness, management of chronic disease, and access to health care. Results for all measures are found in the detailed appendix tables.

It should be noted that this chapter does not provide a comprehensive assessment of health care differences in each priority population. Most of the measures tracked in the NHDR were selected to be applicable across many population groups; only a few, such as immunizations among children and screening for breast cancer among women, were specific to particular groups. For some groups, these general measures overlook important health care problems specific to particular populations. In addition, national data may not address key health issues for specific population groups and are often unable to generate reliable estimates for many smaller groups. Instead, this chapter should be seen as a starting point, identifying some problem areas and indicating gaps in current data and understanding.

Racial and Ethnic Minorities

In 2000, about 30% of the U.S. population identified themselves as members of racial or ethnic minority groups. By 2050, it is projected that these groups will account for almost half of the U.S. population. Census 2000 counted over 36 million Blacks or African Americans (12.9% of the U.S. population); over 35 million Hispanics or Latinos who live in the United States (12.5%) and another 3.8 million who live in the Commonwealth of Puerto Rico[1]; almost 12 million Asians (4.2%)[2]; 874,000 Native Hawaiians and Other Pacific Islanders (0.3%)[3]; and over 2 million American Indians and Alaska Natives (0.7%), of whom 38% reside on Federal trust lands.[4] Racial and ethnic minorities are more likely than non-Hispanic Whites to be poor or near poor.[5] In addition, Hispanics, Blacks, and some Asian subgroups are less likely than non-Hispanic Whites to have a high school education.[6]

As with all U.S. subpopulations, racial and ethnic minority populations presented in the NHDR often comprise diverse subgroups. For example, the Asian and Pacific Islander classification represents individuals originating from more than 100 different countries and territories. Approximately 6% of Blacks are foreign-born adding to the diversity already present among U.S.-born African Americans. American Indian populations encompass numerous tribal nations. Hispanics comprise large numbers of recent immigrants and long-term residents from 20 Spanish-speaking countries across the Americas and Spain. Increases in Hispanic subpopulations together with the aging of the younger Hispanic population overall present a timely opportunity to focus on health care and health care disparities for Hispanics.[7]

In previous chapters of the 2006 NHDR, health care differences by racial[i] and ethnic[ii] categories as defined by the Office of Management and Budget and used by the U.S. Census Bureau are described.[8] In this section, quality of and access to health care for each minority group is summarized. Criteria for importance are that the difference is statistically significant at the alpha=0.05 level, two-tailed test and that the relative difference is at least 10% different from the reference group when framed positively as a favorable outcome or negatively as an adverse outcome. Access measures focus on facilitators and barriers to health care and exclude health care utilization measures.

In addition, changes in differences related to race and ethnicity over time are examined in this section. For each core report measure, racial, ethnic, and socioeconomic groups are compared with a designated comparison group at different points in time. Consistent with Healthy People 2010, disparities are measured in relative terms as the percent difference between each group and a comparison group; changes in disparity are measured by subtracting the percent difference from the comparison group at the baseline year from the percent difference from the comparison group at the most recent year. The change in each disparity is then divided by the number of years between the baseline and most recent estimate to calculate change in disparity per year. Core report measures for which the relative differences are changing less than 1% per year are identified as staying the same. Core report measures for which the relative differences are becoming smaller at a rate of more than 1% per year are identified as improving disparities. Core report measures for which the relative differences are becoming larger at a rate of more than 1% per year are identified as worsening disparities. Changes of greater than 5% per year are also differentiated from changes of between 1% and 5% per year in some figures.

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[i] Races include: Black or African American, Asian, Native Hawaiian or Other Pacific Islander, American Indian and Alaska Native, White, and persons of multiple races.

[ii] Ethnicity differentiates Hispanics and non-Hispanics. Among non-Hispanics, this report identifies non-Hispanic Whites and non-Hispanic Blacks.

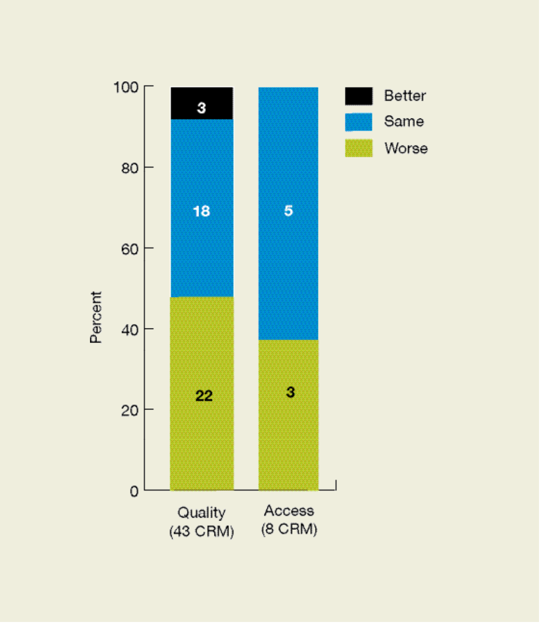
As in previous NHDRs, this section includes information on programs and issues that may affect racial and ethnic disparities. The assessment of disparities faced by American Indians and Alaska Natives includes information on the approximately 45% of American Indians and Alaska Natives who obtain care from Indian Health Service (IHS) facilities.

In interpreting findings for racial and ethnic minorities, readers should note that considerable gaps in information for some racial and ethnic minorities exist, which limit the NHDR's ability to identify the current state of disparities for some groups. Gaps can relate to insufficient data to produce reliable estimates or, when estimates are possible, to inadequate power to detect large differences. For example, of core report measures of quality, it is rarely possible to provide estimates for Native Hawaiians or Other Pacific Islanders and persons of more than one race. For Asians, only about two-thirds of core report measures of quality support analyses; and for American Indians and Alaska Natives, only about half of these same measures support analyses. The Highlights section of this report presents a more detailed description of current data limitations and ways in which data are gradually improving.

Blacks or African Americans

Previous NHDRs showed that Blacks had poorer quality of care and worse access to care than Whites for many measures tracked in the reports. Findings based on 43 core report measures of quality and 8 core report measures of facilitators and barriers to health care are shown below.

Figure 4.1. Blacks compared with Whites on measures of quality and access



Better = Blacks receive better quality of care or have better access to care than Whites.

Same = Blacks and Whites receive about the same quality of care or access to care.

Worse = Blacks receive poorer quality of care or have worse access to care than Whites.

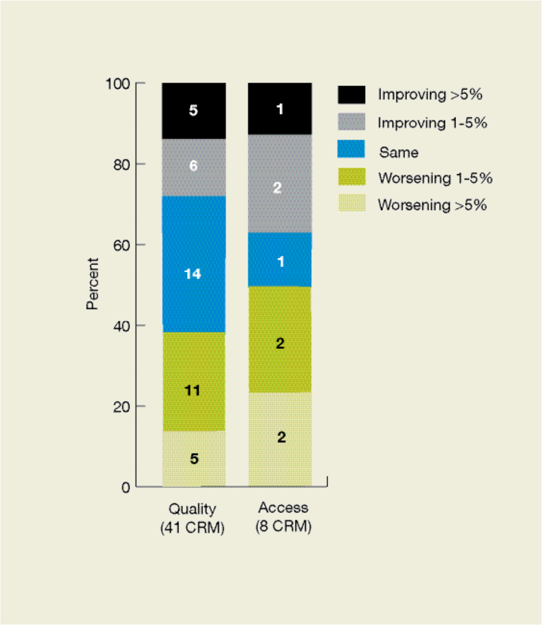
CRM= core report measures.

Note: Data presented are the most recent available.

- For 22 of the 43 core report measures of quality, Blacks had poorer quality of care than Whites (Figure 4.1). Black-White differences ranged from Blacks being over 10 times as likely as Whites to be diagnosed with AIDS[iii] to Blacks being 56% less likely than Whites to commit suicide. The median difference over all 43 core report measures was 16% (Blacks 16% more likely to receive poorer quality care than Whites).
- For 3 of the 8 core report measures of access, Blacks had significantly worse access to care than Whites. Differences ranged from Blacks being 35% more likely than Whites to have communication problems with their children's providers to Blacks being 4% less likely than Whites to have a specific source of ongoing care. The median difference over all 8 core report measures was 15% (Blacks 15% more likely to have worse access to care than Whites).

[iii] Although differences in developing AIDS do not necessarily translate into differences in quality of care, early and appropriate treatment of HIV disease can delay progression to AIDS.

Figure 4.2. Change in Black-White disparities over time



Improving >5% = Black-White difference becoming smaller at rate greater than 5% per year.

Improving 1-5% = Black-White difference becoming smaller at rate between 1% and 5% per year.

Same = Black-White difference not changing.

Worsening 1-5% = Black-White difference becoming larger at rate between 1% and 5% per year.

Worsening >5% = Black-White difference becoming larger at rate greater than 5% per year.

CRM= core report measures.

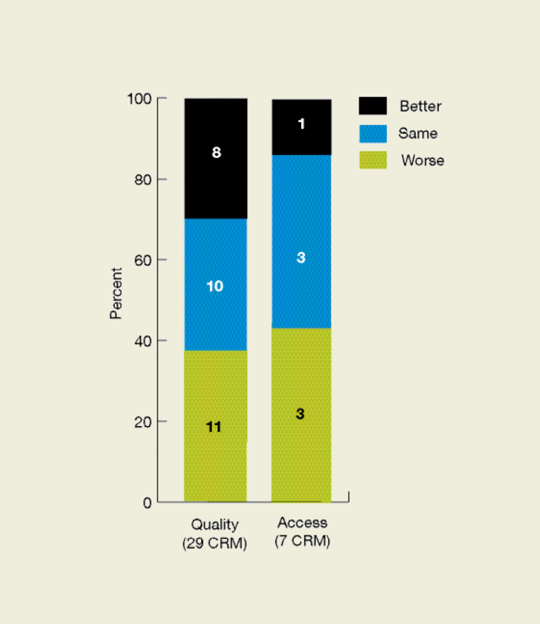
Note: The most recent and oldest years of data available are compared. Only 41 core report measures of quality could be tracked over time for Blacks and Whites.

- Of core report measures of quality that could be tracked over time for Blacks and Whites, Black-White differences became smaller for 11 measures and larger for 16 measures (Figure 4.2). For 14 measures, Black-White differences did not change over time.
- Of core report measures of access that could be tracked over time for Blacks and Whites, Black-White differences became smaller for 3 measures and larger for 4 measures. For 1 measure, the Black-White difference did not change over time.

Asians

Previous NHDRs showed that Asians had similar or better quality of care than Whites but worse access to care than Whites for many measures tracked in the reports. Findings based on 29 core report measures of quality and 7 core report measures of facilitators and barriers to health care that support estimates for either Asians or Asians and Pacific Islanders in aggregate are shown below.

Figure 4.3. Asians compared with Whites on measures of quality and access



Better = Asians receive better quality of care or have better access to care than Whites.

Same = Asians and Whites receive about the same quality of care or access to care.

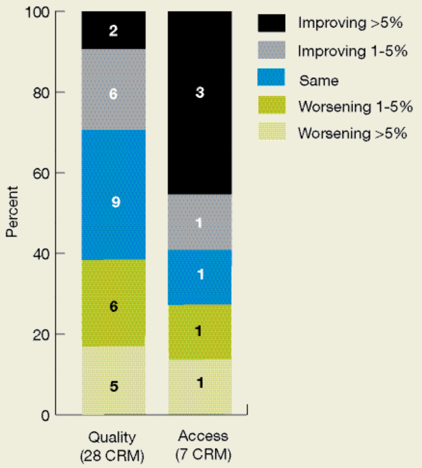
Worse = Asians receive poorer quality of care or have worse access to care than Whites.

CRM= core report measures.

Note: Data presented are the most recent available.

- For 11 of the 29 core report measures of quality, Asians had significantly poorer quality of care than Whites, while for 8 measures, Asians had significantly better quality of care than Whites (Figure 4.5). The median difference over all 29 core report measures was -2% (Asians 2% less likely to receive poorer quality care than Whites).
- For 3 of the 7 core report measures of access, Asians had significantly worse access to care than Whites. Asian-White differences ranged from Asian parents being 2.3 times as likely as Whites to report communication problems with their child's providers to Asians being 32% less likely to report difficulties or delays getting care. The median difference over all 7 core report measures was 8% (Asians 8% more likely to have worse access to care than Whites).

Figure 4.4. Change in Asian-White disparities over time



Improving >5% = Asian-White difference becoming smaller at rate greater than 5% per year.

Improving 1-5% = Asian-White difference becoming smaller at rate between 1% and 5% per year.

Same = Asian-White difference not changing.

Worsening 1-5% = Asian-White difference becoming larger at rate between 1% and 5% per year.

Worsening >5% = Asian-White difference becoming larger at rate greater than 5% per year.

CRM= core report measures.

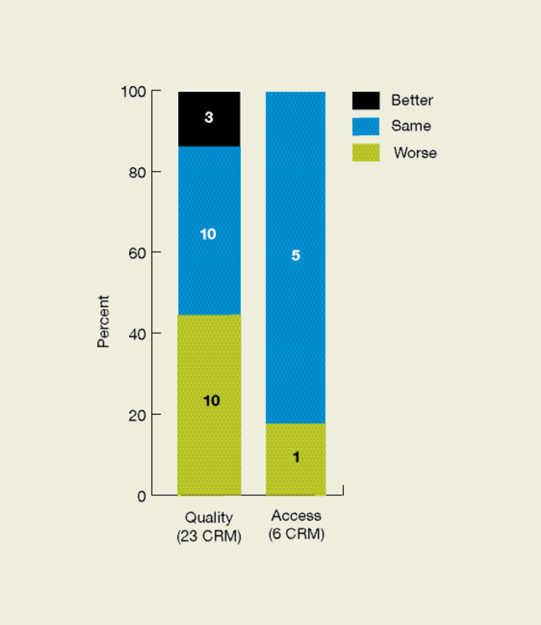
Note: The most recent and oldest years of data available are compared. Only 28 core report measures of quality could be tracked over time for Asians and Whites.

- Of core report measures of quality that could be tracked over time for Asians and Whites, Asian-White differences became smaller for 8 measures but larger for 11 measures (Figure 4.6). For 9 measures, Asian-White differences did not change over time.
- Of core report measures of access that could be tracked over time for Asians and Whites, Asian-White differences became smaller for 4 measures but larger for 2 measures. For 1 measure, the Asian-White difference did not change over time.

American Indians and Alaska Natives

Previous NHDRs showed that American Indians and Alaska Natives (AI/ANs) had poorer quality of care and worse access to care than Whites for many measures tracked in the reports. Findings based on 23 core report measures of quality and 6 core report measures of access are shown below.

Figure 4.5. AI/ANs compared with Whites on measures of quality and access



Better = AI/ANs receive better quality of care or have better access to care than Whites.

Same = AI/ANs and Whites receive about the same quality of care or access to care.

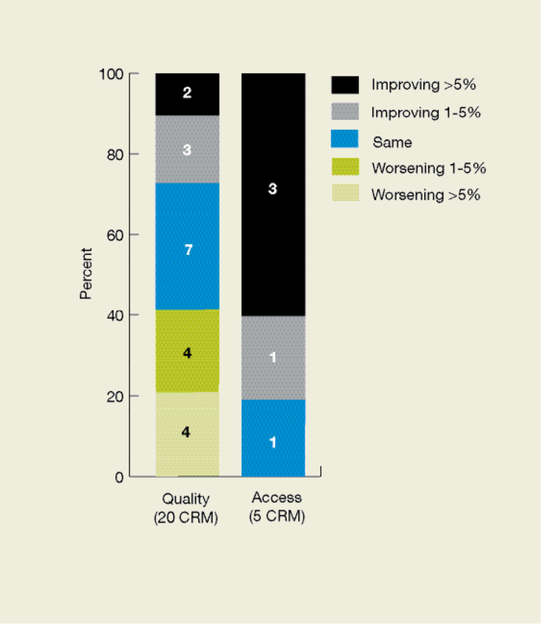
Worse = AI/ANs receive poorer quality of care or have worse access to care than Whites.

CRM= core report measures.

Note: Data presented are the most recent available.

- Only about half of the core report measures supported estimates of quality for AI/ANs.
- For 10 of the 23 core report measures of quality, AI/ANs had significantly poorer quality of care than Whites (Figure 4.5). AI/AN-White differences ranged from AI/ANs being twice as likely as Whites to lack early prenatal care to AI/ANs being 37% less likely to die from colorectal cancer. The median difference over all 23 core report measures was 12% (AI/ANs 12% more likely to receive poorer quality care than Whites).
- For 1 of the 6 core report measures of access, AI/ANs had significantly worse access to care than Whites. AI/AN-White differences ranged from AI/ANs under age 65 being over twice as likely as Whites to lack health insurance to AI/ANs being 12% less likely than Whites to report communication problems. The median difference over all 6 core report measures was 40% (AI/ANs 40% more likely to have worse access than Whites).

Figure 4.6. Change in AI/AN-White disparities over time



Improving >5% = AI/AN-White difference becoming smaller at rate greater than 5% per year.

Improving 1-5% = AI/AN-White difference becoming smaller at rate between 1% and 5% per year.

Same = AI/AN-White difference not changing.

Worsening 1-5% = AI/AN-White difference becoming larger at rate between 1% and 5% per year.

Worsening >5% = AI/AN-White difference becoming larger at rate greater than 5% per year.

CRM= core report measures.

Note: The most recent and oldest years of data available are compared. Only 20 core report measures of quality and 5 core report measures of access could be tracked over time for AI/ANs and Whites.

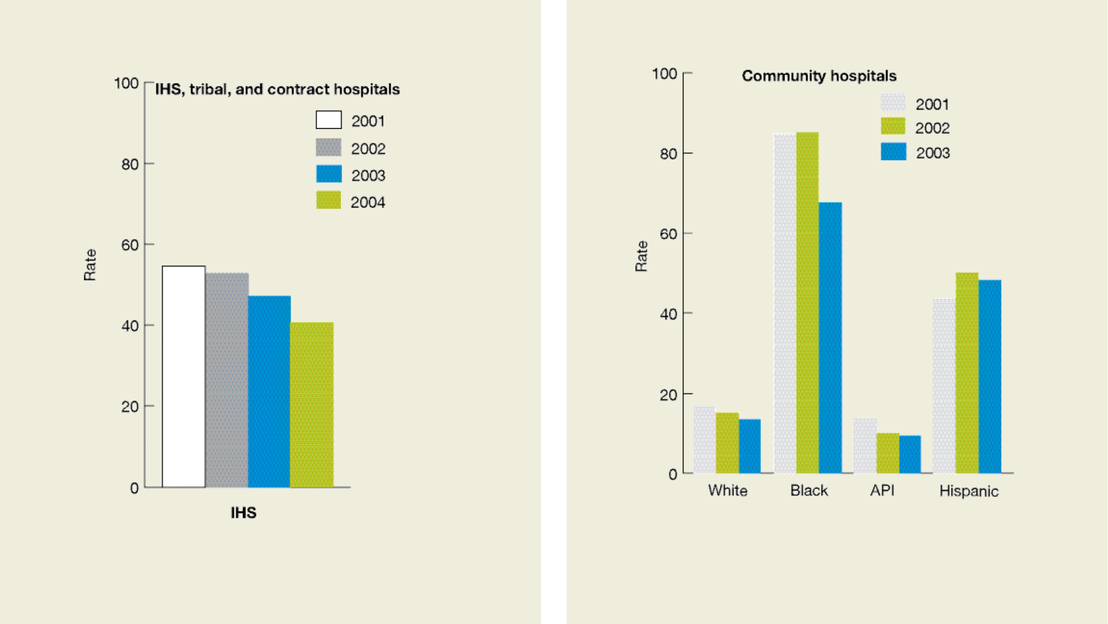
- Less than half of the core report measures supported estimates for changing disparities for AI/ANs.
- Of core report measures of quality that could be tracked over time for AI/ANs and Whites, AI/AN-White differences became smaller for 5 measures but larger for 8 measures (Figure 4.6). For 7 measures, AI/AN-White differences did not change over time.
- Of core report measures of access that could be tracked over time for AI/ANs and Whites, AI/AN-White differences became smaller for 4 measures. For 1 measure, the AI/AN-White difference did not change over time.

Focus on Persons Receiving Care in Indian Health Service Facilities

Forty-five percent of American Indians and Alaska Natives nationwide rely on the Indian Health Service to provide access to health care.[9] Due to low numbers and lack of data, information about AI/AN hospitalizations is difficult to obtain in most Federal and State hospital utilization data sources. The NHDR addresses this gap by examining utilization data from IHS, tribal, and contract hospitals for two quality measures focusing on treatment: hospitalizations for uncontrolled diabetes per 100,000 population and hospitalizations for perforated appendix per 1,000 admissions.

Treatment: diabetes related hospitalizations. Diabetes is one of the leading causes of morbidity and mortality among AI/AN populations, and its prevention and control are a major focus of the IHS Director's Chronic Disease Initiative as well as the IHS Health Promotion/Disease Prevention Initiative. As an indication of the success of these initiatives, the hospitalization rate for short- and long-term complications due to diabetes has decreased 15.6% since 1997.

Figure 4.7. Hospitalizations for uncontrolled diabetes per 100,000 population age 18 and older, by race/ethnicity, in IHS, tribal, and contract hospitals, 2001-2004 (left), and community hospitals, 2001-2003 (right)



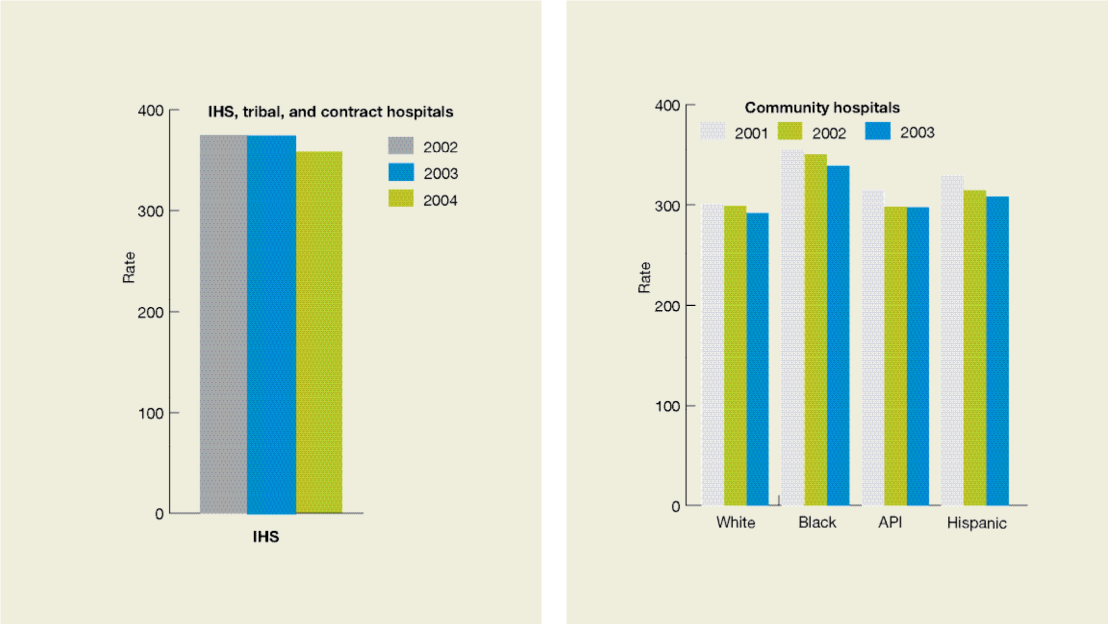
Source: IHS, tribal, and contract hospitals: National Patient Information Reporting System, 2001-2004; community hospitals: HCUP State Inpatient Databases disparities analysis file, 2001-2003.

Note: White, Black, and API are non-Hispanic populations.

- Between 2001 and 2004, hospitalizations for uncontrolled diabetes among AI/ANs 18 years and older in IHS, tribal, and contract hospitals declined 15% from 54.6 to 40.5 per 100,000 population in IHS service areas (Figure 4.7, left).
- In comparison, national community hospital rates were significantly higher among Blacks (67.5 per 100,000) and Hispanics (48.2) than among non-Hispanic Whites (13.5) in 2003 (Figure 4.7, right). From 2001 to 2003, national community hospital rates decreased significantly overall and for Whites and Blacks.

Treatment: hospitalizations for perforated appendix. Addressing barriers of access to health care is a large part of the overall IHS goal which strives to assure that comprehensive, culturally acceptable personal and public health services are available and accessible to American Indian and Alaska Native persons. For the 811,744 AI/ANs living in American Indian and Alaska Native tribal areas (2000) where the climate can be inhospitable, the roads impassable, and transportation scarce, health care facilities can be far from accessible.[10] Perforated appendix hospitalization rates illustrate the continuing efforts to achieve comprehensive care accessible to all AI/ANs.

Figure 4.8. Hospitalizations for perforated appendix per 1,000 admissions with appendicitis, by race/ethnicity, in IHS, tribal, and contract hospitals, 2002-2004 (left), and community hospitals, 2001-2003 (right)



Source: IHS, tribal, and contract hospitals: IHS National Patient Information Reporting System, 2002-2004; community hospitals: HCUP State Inpatient Databases disparities analysis file, 2001-2003.

Note: White, Black, and API are non-Hispanic populations.

- Between 2002 and 2004, hospitalizations for perforated appendix among AI/ANs in IHS, tribal, and contract hospitals declined from 376 to 358 per 1,000 admissions with appendicitis in IHS service areas (Figure 4.8, left).
- In comparison, hospitalizations in community hospitals in 2003 were significantly higher among Blacks (339 per 1,000 admissions) and Hispanics (309) compared with Whites (292) (Figure 4.8, right). From 2001 to 2003, rates in community hospitals decreased significantly overall and for Whites, APIs, and Hispanics.

Native Hawaiians and Other Pacific Islanders

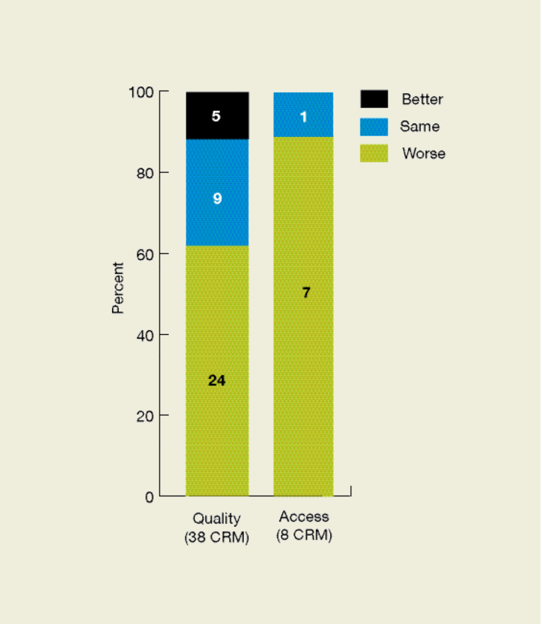
The ability to assess disparities among Native Hawaiians and Other Pacific Islanders (NHOPIs) for the NHDR has been hampered by two main issues. First, the NHOPI racial category is relatively new to Federal data collection. Prior to 1997, NHOPIs were classified as part of the Asian and Pacific Islander racial category and could not be identified separately in most Federal data. In 1997, the Office of Management and Budget promulgated new standards for Federal data on race and ethnicity and mandated that information about NHOPIs be collected separately from information about Asians.[8] Federal agencies had until 2003 to be fully compliant with these standards. Because earlier NHDRs report predominantly on data collected before 2003, many of the databases used had not fully transitioned to the new standards. Hence, few databases could provide any estimates for the NHOPI population. Second, when information about this population was collected, databases often included insufficient numbers of NHOPIs to allow reliable estimates.

Consequently, in previous NHDRs, estimates for the NHOPI population could be generated for only about 5 NHDR core measures. However, problems persist. In this NHDR, of the 42 core report measures of quality, estimates for NHOPIs could be made for only 3—1 measure from the National Health Interview Survey and 2 measures from the CMS Home Health Care Outcome and Assessment Information Set. Of the 8 core report measures of access, estimates for NHOPIs could be made for only 3—persons with health insurance and persons with a source of ongoing care from the National Health Interview Survey and persons with a primary care provider from the Medical Expenditure Panel Survey. A lack of quality data on this population prohibits the NHDR from detailing disparities for this group. As more data become available, this information will be included in future reports.

Hispanics or Latinos

Previous NHDRs showed that Hispanics had poorer quality of care and worse access to care than non-Hispanic Whites for many measures tracked in the reports. Findings based on 38 core report measures of quality and 8 core report measures of access to health care that support estimates for Hispanics are shown below.

Figure 4.9. Hispanics compared with non-Hispanic Whites on measures of quality and access



Better = Hispanics receive better quality of care or have better access to care than non-Hispanic Whites.

Same = Hispanics and non-Hispanic Whites receive about the same quality of care or access to care.

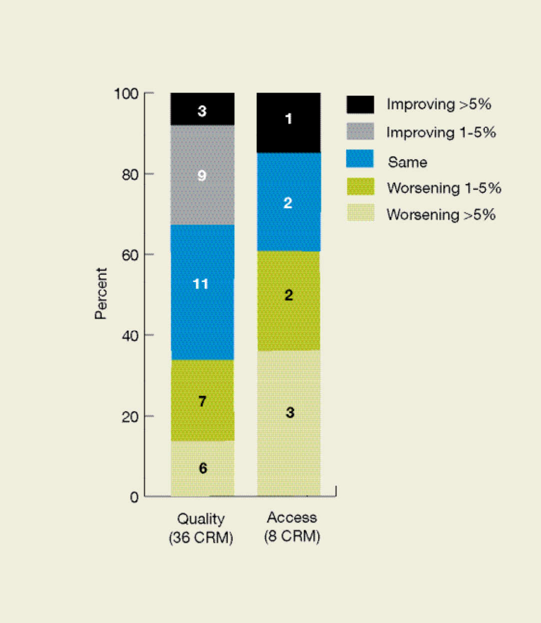
Worse = Hispanics receive poorer quality of care or have worse access to care than non-Hispanic Whites.

CRM= core report measures.

Note: Data presented are the most recent available.

- For 24 of the 38 core report measures of quality, Hispanics had poorer quality of care than non-Hispanic Whites (Figure 4.9). Differences ranged from Hispanics being over 3.5 times as likely to be diagnosed with AIDS to Hispanics being 56% less likely to commit suicide. The median difference over all 38 core report measures was 20% (Hispanics 20% more likely to receive poorer quality care than non-Hispanic Whites).
- For 7 of the 8 core report measures of access, Hispanics had worse access to care than non-Hispanic Whites. Differences ranged from Hispanics under age 65 being 2.9 times as likely to lack health insurance to Hispanics being 10% less likely to report difficulties or delays getting care. The median difference over all 8 core report measures was 88% (Hispanics 88% more likely to have worse access than non-Hispanic Whites).

Figure 4.10. Change in Hispanic–non-Hispanic White disparities over time



Improving >5% = Hispanic–non-Hispanic White difference becoming smaller at rate greater than 5% per year.

Improving 1-5% = Hispanic–non-Hispanic White difference becoming smaller at rate between 1% and 5% per year.

Same = Hispanic–non-Hispanic White difference not changing.

Worsening 1-5% = Hispanic–non-Hispanic White difference becoming larger at rate between 1% and 5% per year.

Worsening >5% = Hispanic–non-Hispanic White difference becoming larger at rate greater than 5% per year.

CRM= core report measures.

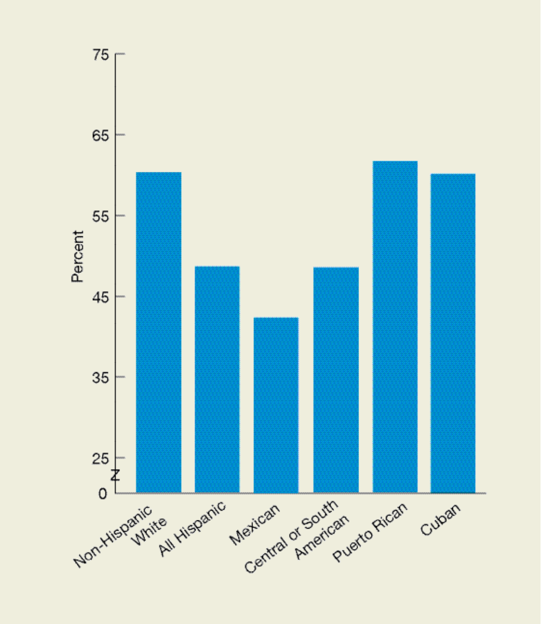
Note: The most recent and oldest years of data available are compared. Only 36 core report measures of quality could be tracked over time for Hispanics and non-Hispanic Whites.

- Of core report measures of quality that could be tracked over time for Hispanics and non-Hispanic Whites, Hispanic–non-Hispanic White differences became smaller for 12 measures but larger for 13 measures (Figure 4.10). For 11 measures, Hispanic–non-Hispanic White differences did not change over time.
- Of core report measures of access that could be tracked over time for Hispanics and non-Hispanic Whites, Hispanic–non-Hispanic White differences became smaller for 1 measure but larger for 5 measures. For 2 measures, Hispanic–non-Hispanic White differences did not change over time.

Focus on Hispanic Subpopulations

The Hispanic population in the United States is highly heterogeneous. Almost 60% are of Mexican origin, making it the largest Hispanic subpopulation in the country. People originating from Puerto Rico, Central America, and South America are the next largest subgroups. Among Hispanics, variation in access to and quality of health care has been observed related to country of origin. Findings are presented below on differences among different Hispanic subpopulations in three quality measures focusing on prevention, timeliness, and patient centeredness—advice to quit smoking, care for illness or injury as soon as wanted, and the patient experience of care, respectively—and one access measure—uninsurance.

Figure 4.11. Adult smokers receiving advice to quit smoking, by ethnicity and country of origin, 2003

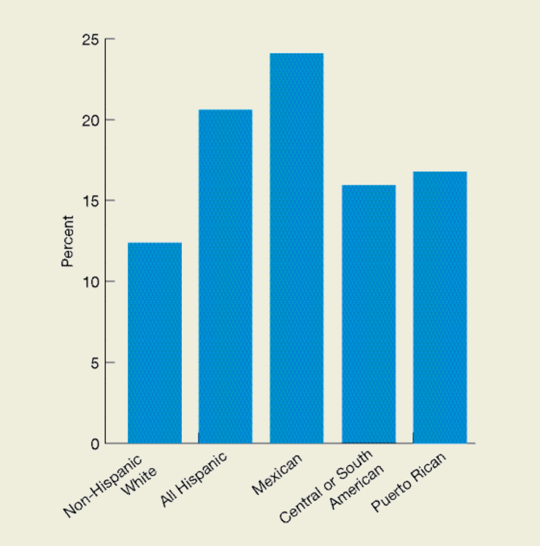


Source: Medical Expenditure Panel Survey, 2003.

Reference population: Civilian noninstitutionalized smokers age 18 and over.

- The percentage of adult smokers receiving advice to quit smoking is significantly lower among all Hispanics compared with non-Hispanic Whites (Figure 4.11).
- Among Hispanic subpopulations, Mexicans have the lowest rates of advice to quit smoking, and their rate is significantly lower compared with non-Hispanic Whites.

Figure 4.12. Adults who sometimes or never get care for illness or injury as soon as wanted, by ethnicity and country of origin, 2003

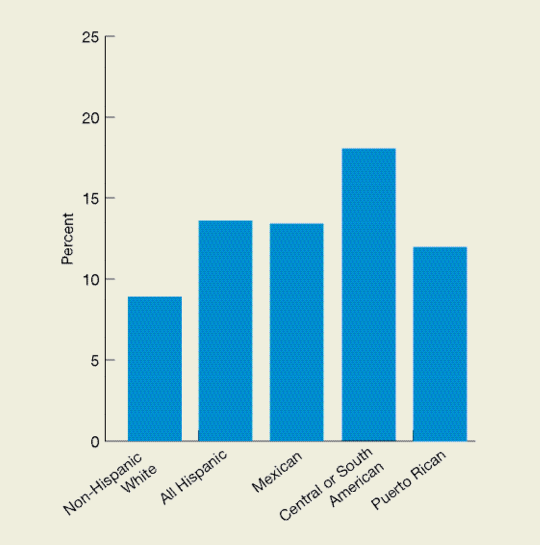


Source: Medical Expenditure Panel Survey, 2003.

Reference population: Civilian noninstitutionalized population age 18 and over.

- The percentage of adults who sometimes or never get care for illness or injury as soon as wanted is significantly higher among all Hispanics compared with non-Hispanic Whites (Figure 4.12).
- Among Hispanic subpopulations, Mexicans have the highest rates, and their rate is significantly higher compared with non-Hispanic Whites.

Figure 4.13. Adults whose providers sometimes or never listened carefully, explained things clearly, showed respect for what they had to say, and spent enough time with them, by ethnicity and country of origin, 2003

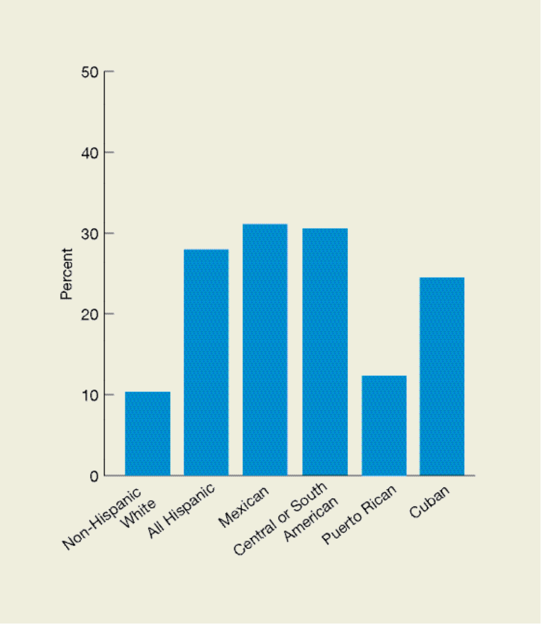


Source: Medical Expenditure Panel Survey, 2003.

Reference population: Civilian noninstitutionalized population age 18 and over.

- The percentage of adults whose providers sometimes or never listened carefully, explained things clearly, showed respect for what they had to say, and spent enough time with them is significantly higher among all Hispanics compared with non-Hispanic Whites (Figure 4.13).
- Among Hispanic subpopulations, Central or South Americans have the highest rates of poor communication, and their rate and the rate among Mexicans are significantly higher compared with non-Hispanic Whites.

Figure 4.14. People under age 65 uninsured all year, by ethnicity and country of origin, 2003



Source: Medical Expenditure Panel Survey, 2003.

Reference population: Civilian noninstitutionalized population under age 65.

- The percentage of people under age 65 uninsured all year is significantly higher among all Hispanics compared with non-Hispanic Whites (Figure 4.14).
- Among Hispanic subpopulations, Mexicans have the highest rates of uninsurance. The rates for Mexicans, Central or South Americans, and Cubans are significantly higher compared with rates for non-Hispanic Whites.

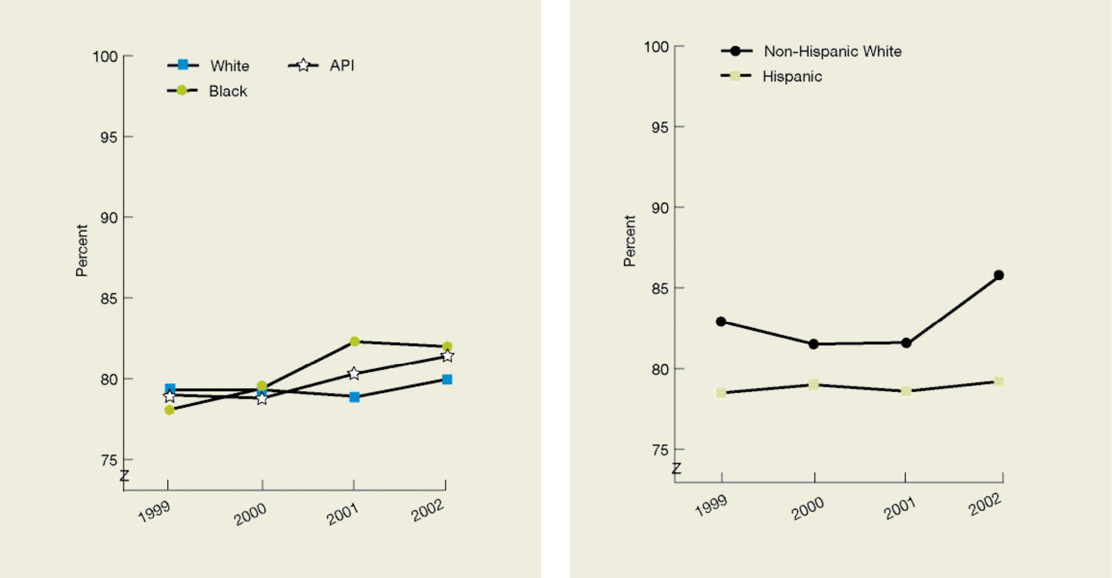
Focus on Recent Immigrants and Limited English-Proficient Populations

Recent Immigrants

Immigrants often encounter barriers to high quality health care. About 30 million persons living in the United States in 2000 were born outside the United States, up from 20 million in 1990. Asians and Hispanics are much more likely to be foreign-born. About 70% of Asians and 40% of Hispanics in the United States are foreign-born compared with 6% of Whites and Blacks.[11] This section identifies differences in one quality measure focusing on treatment—completion of tuberculosis therapy—and one measure of access to care—persons with a usual source of care—for Americans born outside of the United States.

Treatment: completion of tuberculosis therapy. Certain diseases are concentrated among Americans born in other countries. For example, more than half of tuberculosis cases in the Nation are among foreign-born individuals, and the case rate among foreign-born individuals is more than 8 times higher than among individuals born in the United States. The percentage of cases of tuberculosis among U.S.-born individuals is decreasing while the percentage of cases among foreign-born individuals is increasing.[12] Adherence to recommended treatments is important for reducing drug resistant tuberculosis and leads to completion of therapy within 12 months of diagnosis.

Figure 4.15. Completion of therapy for tuberculosis within 12 months of being diagnosed among persons born outside the United States, by race (left) and ethnicity (right), 1999-2002



Key: API=Asian or Pacific Islander.

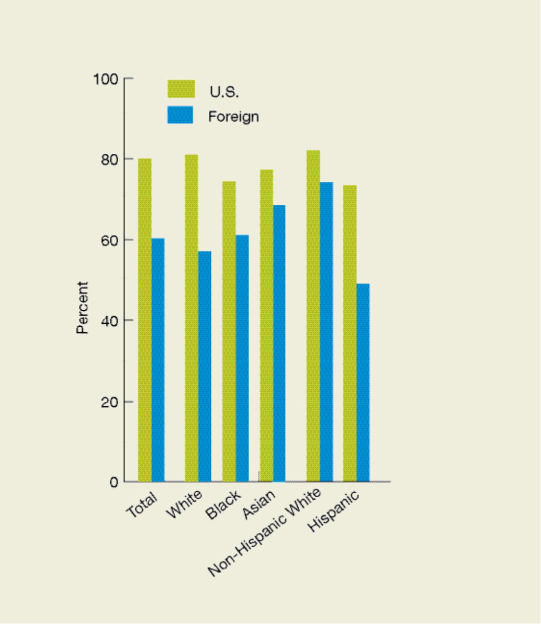
Source: Centers for Disease Control and Prevention, National Tuberculosis Surveillance System, 1999-2002.

Reference population: Foreign-born U.S. resident population with verified tuberculosis, all ages.

- In 1999 and 2002, the proportion of persons who completed therapy for tuberculosis within 12 months of being diagnosed was significantly lower among foreign-born Hispanics compared with foreign-born non-Hispanic Whites (Figure 4.15).
- In 2001, the proportion was significantly higher among foreign-born Blacks compared with foreign-born Whites, but in 2002 this disparity was eliminated.
- From 1999 to 2002, the proportion of persons who completed therapy for tuberculosis within 12 months of being diagnosed increased significantly for the overall foreign-born U.S. population and for foreign-born APIs but did not change significantly for any other group.

Access to care: usual source of care. The patient-primary care provider relationship is built upon mutual respect, trust, and understanding. Being born outside the United States may influence whether patients are able to build such relationships due to cultural, language, or other factors.

Figure 4.16. Persons who have a usual primary care provider, by race and ethnicity, stratified by place of birth, 2003



Source: Medical Expenditure Panel Survey, 2003.

Reference population: Civilian noninstitutionalized population age 18 and over.

- The overall proportion of adults with a usual source of care was significantly lower among foreign-born persons compared with individuals born in the United States (Figure 4.16).
- Compared with U.S.-born Whites, the proportion of adults with a usual source of care was significantly lower among Whites, Blacks, and Asians born outside the United States as well as Blacks born in the United States.
- Compared with U.S.-born non-Hispanic Whites, the proportion of adults with a usual source of care was significantly lower among Hispanics born outside the United States as well as Hispanics born in the United States.

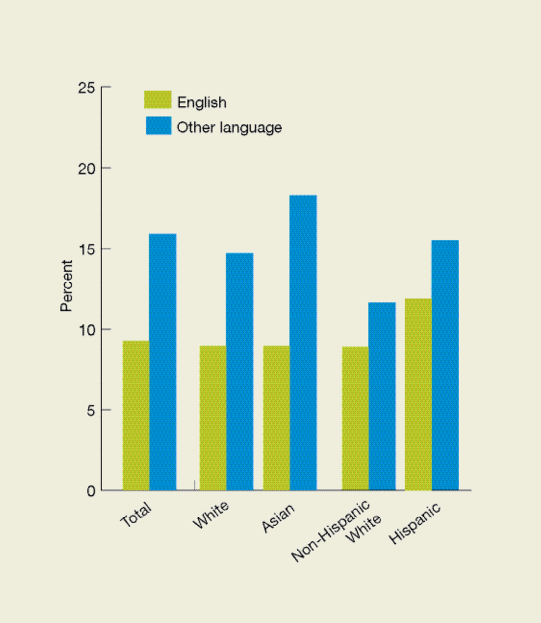
Language Spoken at Home

Quality health care requires that patients and providers communicate effectively. The ability of providers and patients to communicate clearly with one another can be compromised if they do not speak the same language. Quality may suffer if patients with limited English proficiency are unable to express their care needs to providers who speak English only or who do not have an interpreter's assistance.

Limited English proficiency is a barrier to quality health care for many Americans. About 47 million Americans, or 18% of the population, spoke a language other than English at home in 2000, up from 32 million in 1990. Of these individuals, 28 million (about 11% of the population) spoke Spanish, 10 million (about 4% of the population) spoke another Indo-European language, and 7 million (about 3% of the population) spoke an Asian or Pacific Islander language at home. Almost half of persons who spoke a foreign language at home reported not speaking English very well.[13] A study of health plan members and use of interpreters showed that the use of interpreters reduced disparities for Hispanic and API members (28% and 21%, respectively).[14] Findings are presented below on differences in one quality measure focusing on patient centeredness—the patient experience of care—and one access measure—uninsurance—between persons who speak English at home and those who speak some other language at home.

Patient centeredness: patient experience of care. Communication problems between the patient and provider can lead to lower patient adherence to medications and decreased participation in medical decisionmaking. Language problems can also exacerbate cultural differences that impair the delivery of quality health care.

Figure 4.17. Adults whose health providers sometimes or never listened carefully, explained things, showed respect, and spent enough time with them, by race and ethnicity, stratified by language spoken at home, 2003



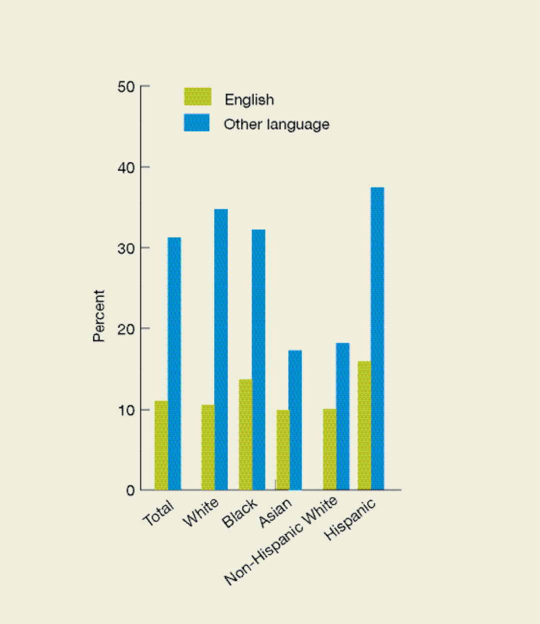
Source: Medical Expenditure Panel Survey, 2003.

Denominator: Civilian noninstitutionalized population age 18 and over.

- The overall proportion of adults whose health providers sometimes or never listened carefully, explained things clearly, respected what they had to say, or spent enough time with them was significantly higher among individuals who speak a foreign language at home compared with individuals who speak English at home (Figure 4.17).
- Compared with Whites who speak English at home, the proportion of adults with communication problems was significantly higher among Whites and Asians who speak some other language at home.
- Compared with non-Hispanic Whites who speak English at home, the proportion of adults with communication problems was significantly higher among Hispanics who speak some other language at home as well as Hispanics who speak English at home.

Access to care: uninsurance. Persons who speak a language other than English at home may have less access to resources, such as health insurance, that facilitate getting needed health care.

Figure 4.18. Adults under age 65 uninsured all year, by race and ethnicity, stratified by language spoken at home, 2003



Source: Medical Expenditure Panel Survey, 2003.

Reference population: Civilian noninstitutionalized population ages 18-64.

- The overall proportion of adults under age 65 uninsured all year was significantly higher among individuals who speak a foreign language at home compared with individuals who speak English at home (Figure 4.18).
- Compared with Whites who speak English at home, the proportion of persons uninsured all year was significantly higher among Whites, Blacks, and Asians who speak some other language at home as well as Blacks who speak English at home.
- Compared with non-Hispanic Whites who speak English at home, the proportion of persons uninsured all year was significantly higher among Hispanics who speak some other language at home as well as Hispanics who speak English at home.

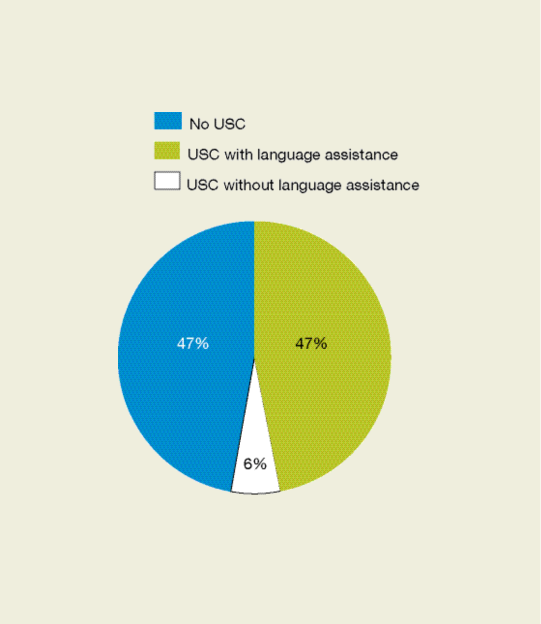
Language Assistance

Clear communication is an important component of effective health care delivery. It is vital for providers to understand patients' health care needs and for patients to understand providers' diagnoses and treatment recommendations. Communication barriers can relate to language, culture, and health literacy.

For persons with limited English proficiency, having language assistance is of particular importance. Persons with limited English proficiency may choose a usual source of care in part based on language concordance; thus, not having a language-concordant provider may limit or discourage some patients from establishing a usual source of care

This year's NHDR includes a supplemental measure of access: provision of language assistance by the usual source of care. Language assistance includes bilingual clinicians, trained medical interpreters, and bilingual receptionists and other informal interpreters.

Figure 4.19. Adults with limited English proficiency with and without a usual source of care who offers language assistance, 2003



Key: USC = usual source of care.

Source: Medical Expenditure Panel Survey, 2003.

Reference population: Civilian noninstitutionalized population age 18 and over.

Note: Language assistance includes bilingual clinicians, trained medical interpreters, and informal interpreters (e.g., bilingual receptionists).

- A large proportion of individuals with limited English proficiency do not have a usual source of care—47% (Figure 4.19).
- Another 47% of individuals with limited English proficiency have a usual source of care that offers language assistance.
- Only 6% of individuals with limited English proficiency have a usual source of care that does not offer language assistance.

Low Income Groups

The poor are defined as persons living in families whose household income falls below specific poverty thresholds. These thresholds vary by family size and composition and are updated annually by the U.S. Bureau of the Census.[iv, 15] After falling for nearly a decade, the numbers of poor persons in America rose from 31.6 million in 2000 to 37.0 million in 2005, and the poverty rate increased from 11.3% to 12.6% over the same period.

Poverty varies by race and ethnicity. In 2005, 25% of Blacks, 22% of Hispanics, 11% of Asians, and 8% of Whites were poor.[16] Persons with low incomes often experience worse health and are more likely to die prematurely.[17] In general, the poor have reduced access to high quality care. Income-related differences in quality of care that are independent of health insurance coverage have also been demonstrated.[18]

In previous chapters of this report, health care differences by income were described. In this section, disparities in quality of and access to health care for poor[v] compared with high income[vi] individuals are summarized. For each core report measure, poorer persons can have health care that is worse than, about the same as, or better than health care received by high income persons. Only relative differences of at least 10% that are statistically significant with alpha=0.05 are discussed in this report. Access measures focus on facilitators and barriers to health care and exclude health care utilization measures.

In addition, changes in differences related to income over time are examined. For each core report measure, racial, ethnic, and socioeconomic groups are compared with a designated comparison group at different points in time. Consistent with Healthy People 2010, disparities are measured in relative terms as the percent difference between each group and a comparison group; changes in disparity are measured by subtracting the percent difference from the comparison group at the baseline year from the percent difference from the comparison group at the most recent year. The change in each disparity is then divided by the number of years between the baseline and most recent estimate to calculate change in disparity per year. Core report measures for which the relative differences are changing less than 1% per year are identified as staying the same. Core report measures for which the relative differences are becoming smaller at a rate of more than 1% per year are identified as improving disparities. Core report measures for which the relative differences are becoming larger at a rate of more than 1% per year are identified as worsening disparities. Changes of greater than 5% per year are also differentiated from changes of between 1% and 5% per year in some figures.

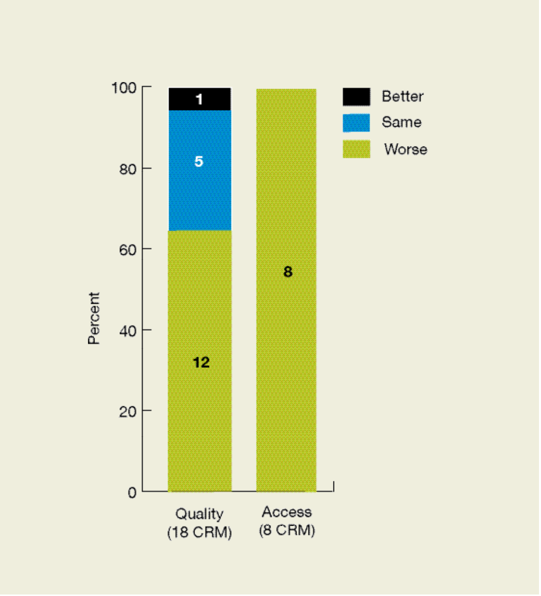
[iv] For example, in 2005 the Federal poverty threshold for a family of 2 adults and 2 children was $19,806.

[v] Household income less than Federal poverty thresholds.

[vi] Household income 400% of Federal poverty thresholds and higher.

As in previous NHDRs, this section includes information on programs that may affect low income groups. This year's report includes three quality measures relating to prevention—screening for colorectal cancer and counseling of overweight adults and children[vii]—and one access measure—dental care—of special relevance to the uninsured. Also included in this section are three access measures focusing on dental care for children served by school-based health centers.[viii]

Figure 4.20. Poor compared with high income individuals on measures of quality and access



Better = Poor receive better quality of care or have better access to care than high income individuals.

Same = Poor and high income individuals receive about the same quality of care or access to care.

Worse = Poor receive poorer quality of care or have worse access to care than high income individuals.

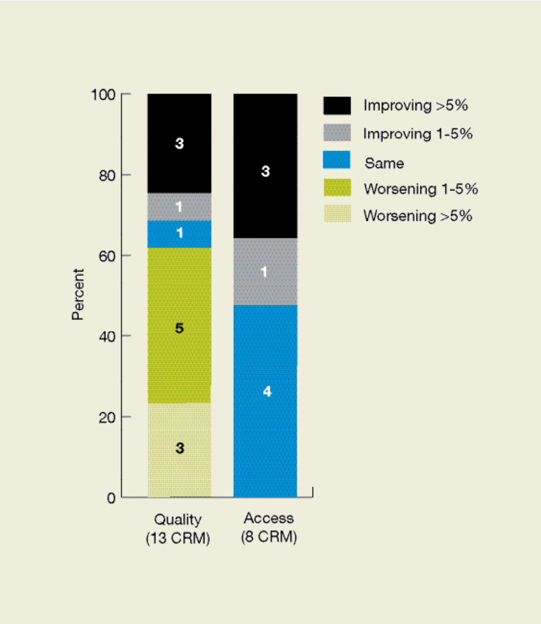
CRM= core report measures.

- Less than half of the core report measures supported estimates of quality for the poor.
- For 12 of the 18 core report measures of quality with income data, the poor had significantly poorer quality of care than high income individuals (Figure 4.20). Differences ranged from poor children being over three times as likely as high income children to be hospitalized for asthma to poor individuals being 15% less likely to lack needed substance abuse treatment. The median difference was 48% (poor individuals 48% more likely to receive poorer quality care than high income individuals).
- For all 8 core report measures of access, the poor had significantly worse access to care than high income individuals. Differences ranged from the poor under age 65 being over five times as likely as high income individuals to lack health insurance to the poor being 73% more likely to lack a primary care provider. The median difference was 2.4 (poor individuals 2.4 times as likely to have worse access as high income individuals).

[vii] Includes one measure for adults—counseling obese adults about exercise—and one measure for children—counseling about healthy eating.

[viii] Includes these measures of dental care for children served by school-based health centers: children who saw or talked with a dentist, health centers that recommended or referred children to another place for dental care, and children that needed but could not access dental care.

Figure 4.21. Change in poor-high income disparities over time



Improving >5% = Poor-high income difference becoming smaller at rate greater than 5% per year.

Improving 1-5% = Poor-high income difference becoming smaller at rate between 1% and 5% per year.

Same = Poor-high income difference not changing.

Worsening 1-5% = Poor-high income difference becoming larger at rate between 1% and 5% per year.

Worsening >5% = Poor-high income difference becoming larger at rate greater than 5% per year.

CRM= core report measures.

Note: The most recent and oldest years of data available are compared. Only 13 core report measures of quality could be tracked over time for poor and high income individuals.

- Less than half of the core report measures supported estimates of changing disparities in quality for the poor.
- Of core report measures of quality that could be tracked over time for poor and high income individuals, poor-high income differences became smaller for 4 measures but larger for 8 measures (Figure 4.21). For 1 measure, the poor-high income difference did not change over time.
- Of core report measures of access that could be tracked over time for poor and high income individuals, poor-high income differences became smaller for 4 measures and larger for 4 measures.

Focus on Uninsurance

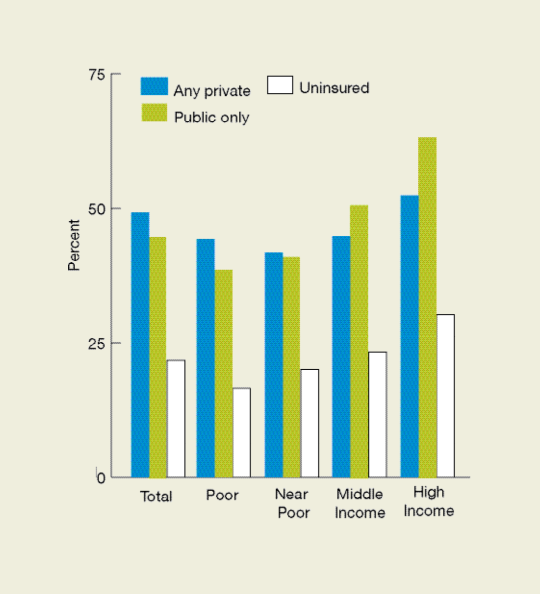
Low-paying jobs are less likely to include health insurance, and the cost of health insurance makes low income individuals less likely to be able to afford insurance. This puts low income individuals at a heightened risk for being uninsured. Compared to insured persons, the uninsured report more problems getting care and are diagnosed at later disease stages.[19, 20] They report poorer health status[21] are sicker when hospitalized, and are more likely to die during their hospital stay.[20] Uninsured persons often avoid non-urgent care such as preventive screenings, have difficulty obtaining care when they ultimately seek it, and must bear the full brunt of health care costs. In addition, prolonged periods of uninsurance can have a particularly serious influence on a person's health and stability.

Three quality measures relating to prevention—colorectal cancer screening, counseling obese adults about exercise, and counseling children about healthy eating—and one access measure—dental care—of particular relevance to the uninsured are highlighted below.

Quality of Health Care

Prevention: screening for colorectal cancer. Screening for colorectal cancer with fecal occult blood testing or sigmoidoscopy is an effective way of reducing new cases of late stage disease and mortality caused by this cancer.

Figure 4.22. Adults age 50 and over who received recommended colorectal screening by income, stratified by insurance status, 2003



Source: National Health Interview Survey, 2003.

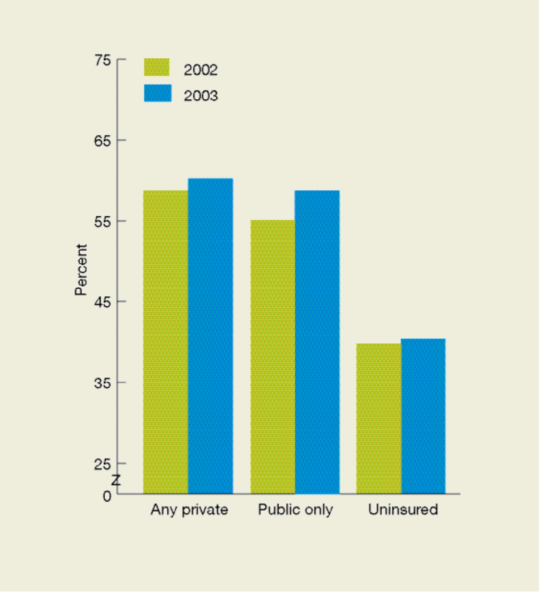
Reference population: Adults age 50 and over in the civilian noninstitutionalized population.

Note: Fecal occult blood testing is recommended every 2 years for adults age 50 and over; sigmoidoscopy is recommended as a one-time screening for adults age 50 and over.

- The proportion of adults age 50 and over who had received recommended colorectal cancer screening was significantly lower for uninsured compared with privately insured persons for the total population and for every income group (Figure 4.22). The proportion was also significantly lower for the total population of publicly insured compared with privately insured persons.
- Compared with privately insured high income persons, the proportion of adults age 50 and over who had received recommended colorectal cancer screening was significantly lower among uninsured poor, near poor, and middle income persons; among publicly insured poor and near poor persons; and among privately insured near poor and middle income persons.

Prevention: counseling obese adults about exercise. Regular exercise aids in weight loss and blood pressure control, reducing the risk of heart disease, stroke, diabetes, and other diseases.

Figure 4.23. Obese adults given advice about exercise by their doctor or other health provider, by insurance status, 2002 and 2003



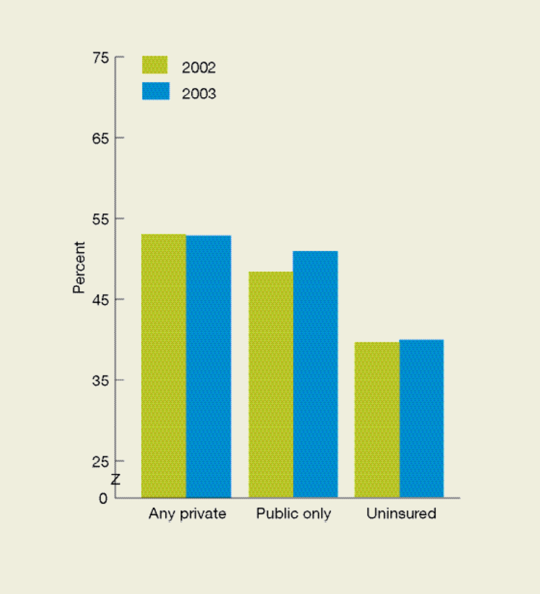
Source: Medical Expenditure Panel Survey, 2002 and 2003.

Reference population: Civilian noninstitutionalized population age 18 and over.

- In both years, the proportion of obese adults who were given advice about exercise was significantly lower among uninsured compared with privately insured persons (Figure 4.23).
- From 2002 to 2003, no significant trends were observed.

Prevention: counseling overweight children about healthy eating. Counseling about healthy eating can play an important role in helping children to loose excess weight and establish healthy lifestyle behaviors.

Figure 4.24. Overweight children ages 2-19 whose parents/guardians reported advice from a doctor or other health provider about healthy eating, by insurance status, 2002 and 2003



Source: Medical Expenditure Panel Survey, 2002 and 2003.

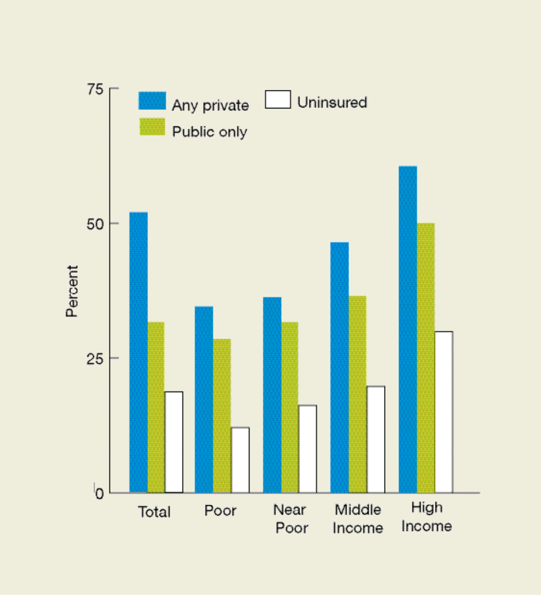
Reference population: Civilian noninstitutionalized population ages 2-19.

- In both years, the proportion of children ages 2-19 whose parents/guardians reported advice from a doctor or other health provider about healthy eating was significantly lower among uninsured and publicly insured compared with privately insured persons (Figure 4.24).
- From 2002 to 2003, no significant trends were observed.

Access to Health Care

Dental care. Regular dental visits promote prevention, early diagnosis, and optimal treatment of oral diseases and conditions.

Figure 4.25. Persons with a dental visit in the past year, by income, stratified by insurance status, 2003



Source: Medical Expenditure Panel Survey, 2003.

Reference population: Civilian noninstitutionalized population, all ages.

- The proportion of persons with a dental visit in the past year was significantly lower among uninsured compared with privately insured persons in the total population and in every income group (Figure 4.25).
- For the total population and for near poor and middle income persons, the proportion was also significantly lower among publicly insured compared with privately insured persons.
- For persons of every insurance status, the proportion with a dental visit in the past year was significantly lower among poor, near poor, and middle income compared with high income persons.
- Only high income persons with private health insurance met the Healthy People 2010 target of 56% of persons with a dental visit in the past year.

Focus on Care of Children Served by School-Based Health Centers

Health centers have a 40-year history of providing accessible, affordable, primary, and preventive health care services to low income families. Health centers are funded under Section 330 of the Public Health Service Act, the Health Centers Consolidation Program, and are administered by the Health Resources and Services Administration (HRSA). In 2004, 914 health centers provided care to 13.1 million patients living in rural and urban medically underserved areas and populations. Health centers operate in every State, U.S. territory, and the District of Columbia. They serve clients that are primarily low income and minorities. About 60% of clients have incomes less than 100% of the Federal poverty level, and nearly three-quarters have incomes less than 200% of this level. Similarly, about 60% of clients are racial and ethnic minorities, and about a third are best served in a language other than English.

As part of the President's Health Centers Initiative, HRSA expects newly funded grantees to provide oral health services on site or through referrals. Additionally, HRSA has provided funding opportunities for existing health centers to: (1) establish new oral health services at sites that lack on-site access, or (2) establish new satellite sites to provide oral health services to a population that has lacked access to these services. In fiscal year 2004, more than 2,133 oral health care full-time equivalent dentists and dental hygienists provided oral health care to over 2.1 million health center users. As part of the 2003 Healthy Schools Healthy Communities User Visit Survey, HRSA collected data on the quality of care received by 781 school-aged children served by school-based health centers.[ix] While disparities remain, school-based health centers perform as well as or better than providers outside of health centers in the delivery of accessible, high quality, primary, and preventive oral health care to low income and underserved children.

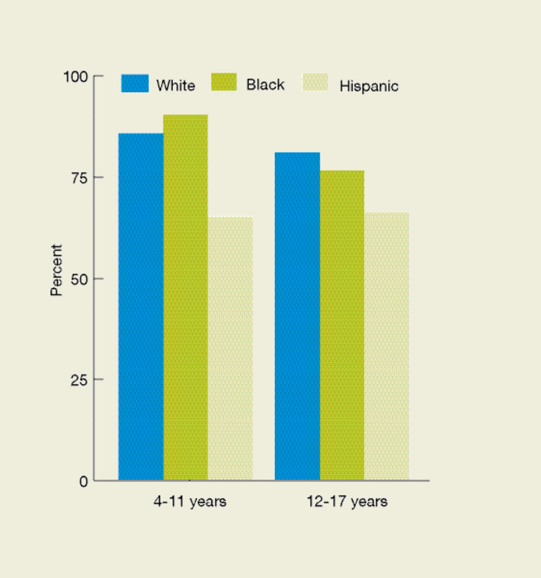
This section identifies differences in three measures of access to dental care for school-aged children served by health centers—children who saw or talked with a dentist, health centers that recommended or referred children to another place for dental care, and children that needed but could not access dental care.

[ix] The Healthy Schools Healthy Communities (HSHC) Section 330 of the Public Health Service Act does not include authorization for the HSHC program. Effective fiscal year 2006, HRSA no longer identifies HSHC as a separate health center program or category/type of health center; however, there will continue to be recognition of school-aged children as an underserved population served by health centers. All organizations receiving section 330 funding specifically to support a HSHC program must comply with the requirements of section 330(e), Community Health Center Program.

Access to Health Care

Dental care. Regular dental care, especially good oral habits formed early in life, can promote good health over a lifetime and help prevent other diseases.

Figure 4.26. Children ages 4-17 who saw or talked with a dentist in the past year, by race/ethnicity, 2003



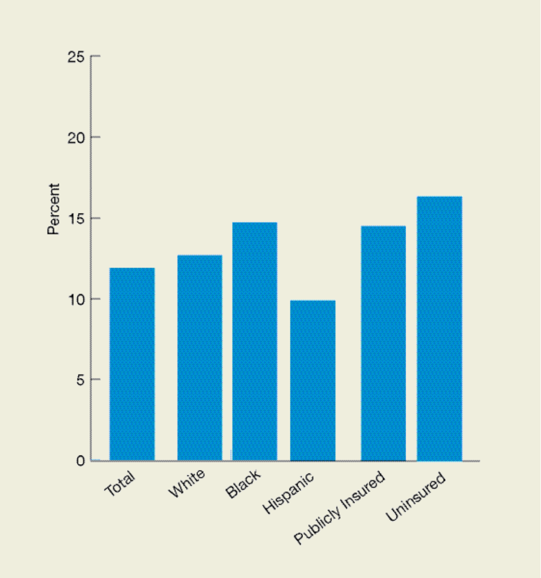
Source: Health Resources and Services Administration, Healthy Schools Healthy Communities User Visit Survey, 2003.

Reference population: Children ages 4-17 years served by a school-based health center.

Note: Whites and Blacks are non-Hispanic groups.

- For both age groups, Hispanic children served by a school-based health center were significantly less likely than White children to have seen or talked with a dentist in the past year (Figure 4.26). Other disparities by race/ethnicity were not observed.
- Among Black children, those ages 4-11 were significantly more likely than those ages 12-17 to have seen or talked with a dentist in the past year. Other disparities by age group were not observed.

Figure 4.27. Children ages 4-17 who were recommended or referred by a school-based health center to another place for dental care, by race/ethnicity and insurance status, 2003



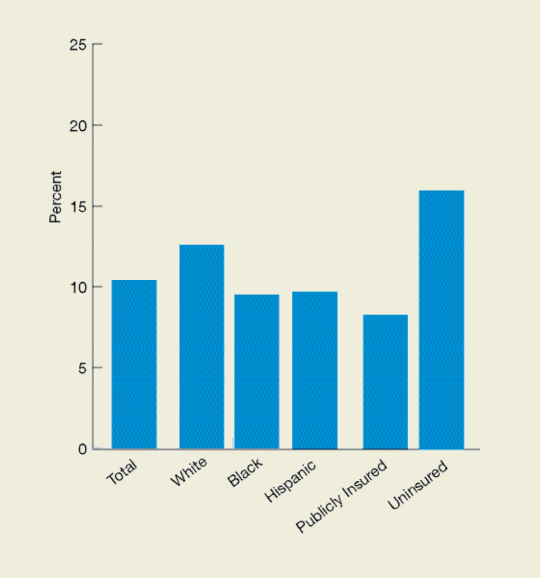
Source: Health Resources and Services Administration, Healthy Schools Healthy Communities User Visit Survey, 2003.

Reference population: Children ages 4-17 years served by a school-based health center.

Note: Whites and Blacks are non-Hispanic groups.

- About 12% of children served by a school-based health center were recommended or referred to another place for dental care (Figure 4.27).
- Disparities by race/ethnicity and by insurance status were not observed.

Figure 4.28. Children ages 4-17 who needed but could not access dental care in the past 6 months, by race/ethnicity and insurance status, 2003



Source: Health Resources and Services Administration, Healthy Schools Healthy Communities User Visit Survey, 2003.

Reference population: Children ages 4-17 served by a school-based health center.

Note: Whites and Blacks are non-Hispanic groups.

- About 10% of children served by a school-based health center who needed dental care in the past 6 months did not receive it (Figure 4.28).
- Disparities by race/ethnicity were not observed.

Women

Census 2000 counted 140 million females, 51% of the U.S. population, of whom 40 million are members of racial or ethnic minority groups.[22] By 2050, it is projected that just under half of females in the United States will be members of racial or ethnic minority groups.[23] The ratio of males to females is highest at birth, when male infants outnumber female infants, and gradually declines with age due to higher male mortality rates. Among Americans 85 and older, women outnumber men by more than 2 to 1.[24] Poverty disproportionately affects women; almost 13.9% of women lived in households with incomes below the Federal poverty level in 2004.[25]

Women in the United States have a life expectancy 5 years longer than men[26] and lower age-adjusted death rates than men for 13 of the 15 leading causes of death.[27] However, women are more likely than men to report having arthritis, asthma,[28] and serious mental illness.[29] There is significant variation in health status and health-related behaviors for women of different races and ethnicities.[30] In general, gender differences in quality of care are small.

Many measures of relevance to women are tracked in the NHDR. Findings presented here highlight four quality measures and one access measure of particular importance to women:

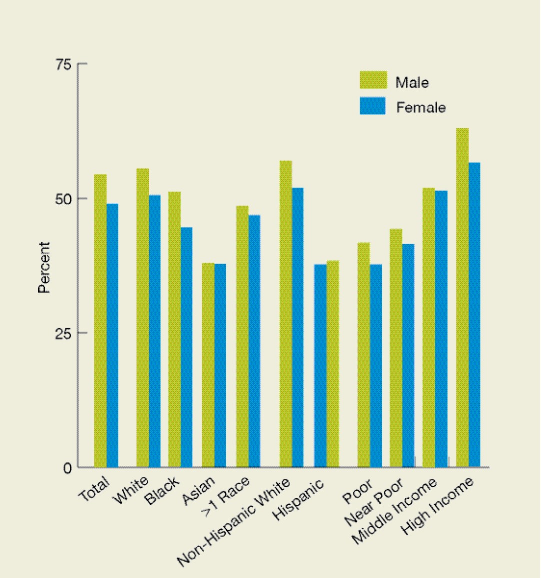
Component of health care need:	**Measure:**
Prevention	Colorectal cancer screening, prenatal care/maternal health
Treatment	Recommended care for heart attack
Management	New AIDS cases
Access to care	Usual source of care

Quality of Health Care

Prevention: Screening for Colorectal Cancer

Ensuring that all populations have access to appropriate cancer screening services is a core element of reducing cancer health disparities.[31] Screening for colorectal cancer with fecal occult blood testing or sigmoidoscopy is an effective way of reducing new cases of late stage disease and mortality caused by this cancer.

Figure 4.29. Adults age 50 and over who received recommended colorectal screening, by race, ethnicity, income, and gender, 2003



Key: AI/AN=American Indian/Alaska Native.

Source: National Health Interview Survey, 2003.

Reference population: Adults age 50 and over in the civilian noninstitutionalized population.

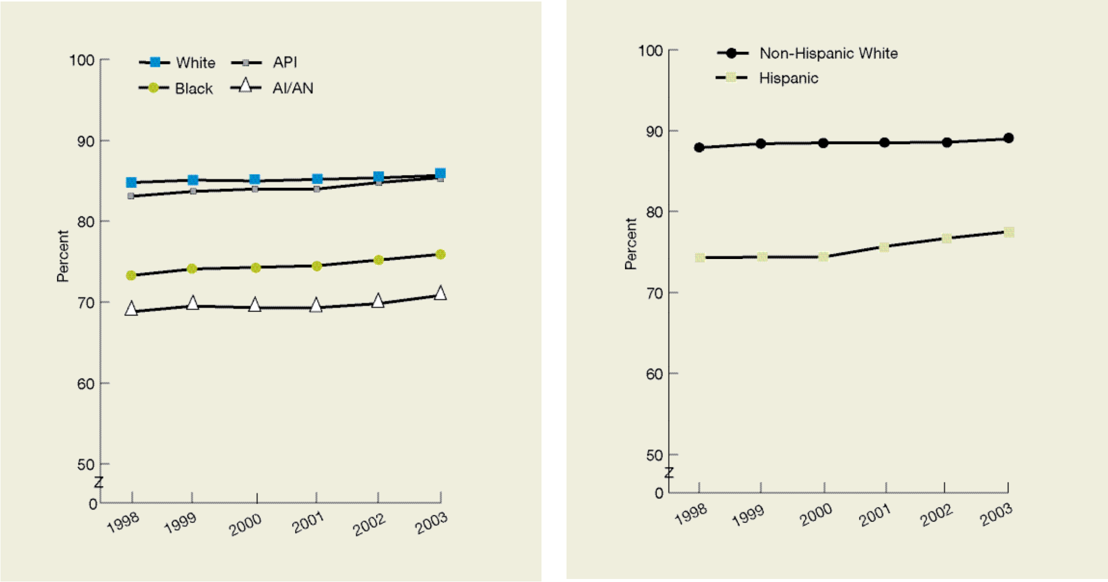
Note: Fecal occult blood testing is recommended every 2 years for adults age 50 and over; sigmoidoscopy is recommended as a one-time screening for adults age 50 and over.

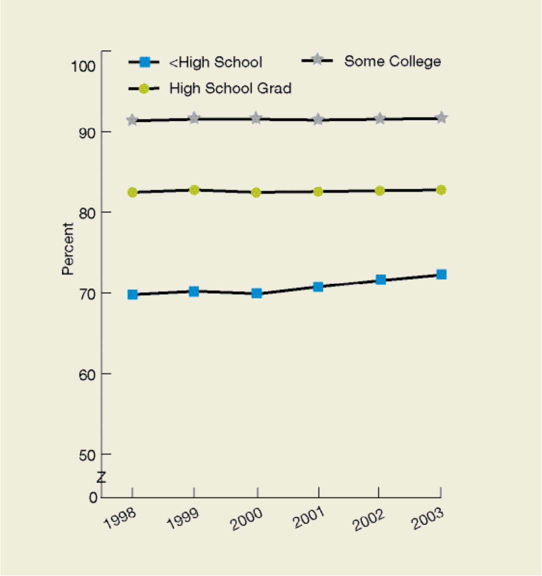
- For the total population, females were significantly less likely to have received a recommended colorectal cancer screening compared with males (Figure 4.29).
- Black and Asian females were significantly less likely than White females; Hispanic females were significantly less likely than non-Hispanic White females; and poor, near poor, and middle income females were significantly less likely than high income females to have received a recommended colorectal cancer screening.
- Within racial, ethnic, and income groups, White, Black, non-Hispanic White, and high income females were significantly less likely than respective males to have received a recommended colorectal cancer screening.

Prevention: Prenatal Care/Maternal Health

Childbirth and reproductive care are the most common reasons for women of childbearing age to use health care; and with more than 11,000 births each day in the United States, childbirth is the most common reason for hospital admission.[32] Given that birth outcomes may have lifetime effects, good prenatal care has the potential to affect the future health and health care needs of the Nation.[33] It is recommended that women begin receiving prenatal care in the first trimester of pregnancy.

Figure 4.30. Mothers with prenatal care in the first trimester by race (top left), ethnicity (top right), and education (bottom left), 1998-2003





Key: API = Asian or Pacific Islander; AI/AN = American Indian or Alaska Native.

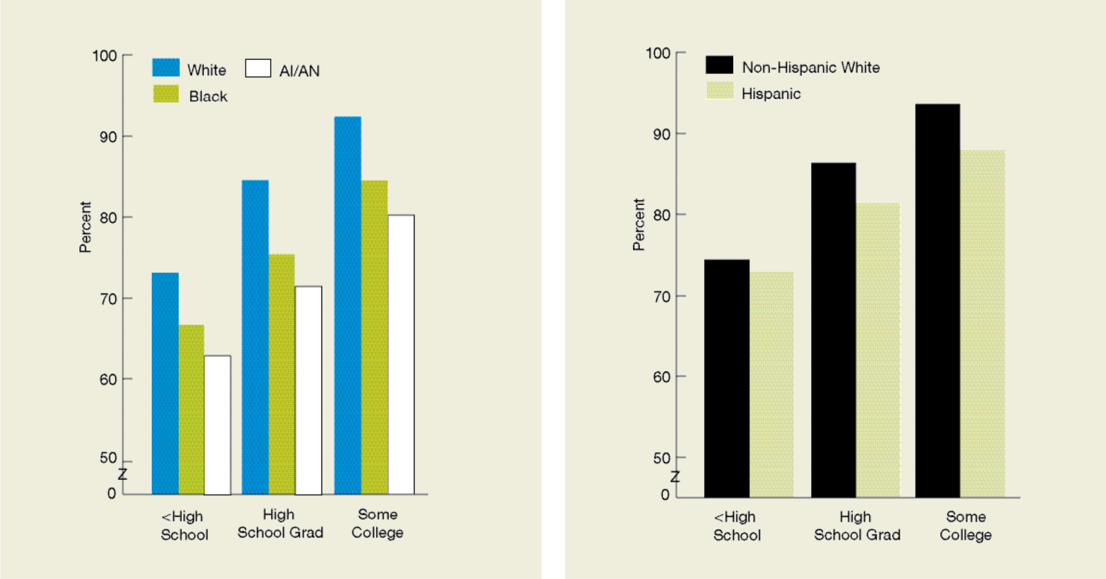
Source: National Vital Statistics System - Natality, 1998-2003.

Reference population: Women with live births.

- In all 6 years, the proportion of women who initiated prenatal care in the first trimester was significantly lower among Black and AI/AN women compared with White women; among Hispanic compared with non-Hispanic White women; and among women with a high school education or less compared with women with any college education (Figure 4.30). In 1998 the proportion was also significantly lower among API compared with White women; but in all other years, this disparity was not observed.
- Between 1998 and 2003, rates of mothers initiating prenatal care in the first trimester did not change significantly for any group.
- Only persons with any college education achieved the Healthy People 2010 target of 90% of pregnant women receiving prenatal care in the first trimester.

Information about income is not typically collected on birth certificates, so education is commonly used as a proxy for socioeconomic status. Racial and ethnic minorities are disproportionately of lower socioeconomic status than Whites.[34] To distinguish the effects of race, ethnicity, and education on quality of health care, this measure is stratified by level of education.

Figure 4.31. Mothers with prenatal care in the first trimester by race (left) and ethnicity (right), stratified by education, 2001



Key: AI/AN=American Indian or Alaska Native.

Source: National Vital Statistics System - Natality, 2001.

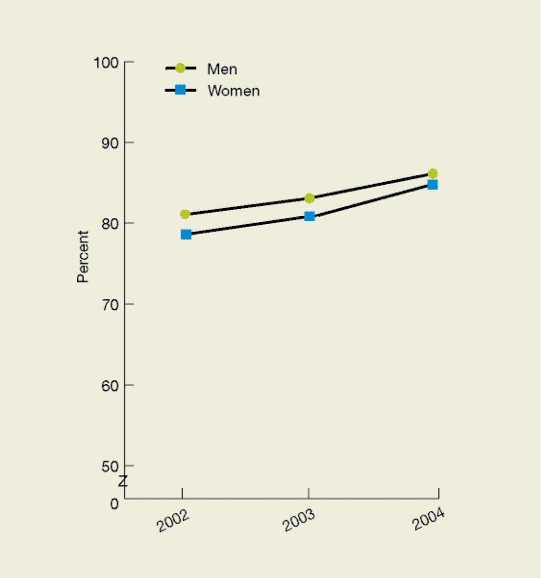
Reference population: Women with live births.

- Education explains some but not all of the differences in health care among women by race and ethnicity. Racial and ethnic differences in mothers who initiate prenatal care in the first trimester tended to persist among women with similar education (Figure 4.31).
- Only college educated Whites and non-Hispanic Whites achieved the Healthy People 2010 target of 90% of mothers receiving prenatal care in the first trimester.

Treatment: Recommended Hospital Care for Heart Attack

Each year, about half a million women die of cardiovascular disease. Among these, 250,000 die of heart attacks.[35] Although heart disease is the leading cause of death among both women and men, sex differences in cardiovascular care have been demonstrated and may relate to sex differences in disease presentation. Moreover, although major risk factors for cardiovascular disease can often be prevented or controlled through lifestyle changes, physicians are less likely to counsel women than men about diet, exercise, and substance abuse.[36] After a first heart attack, women are less likely than men to receive cardiac rehabilitation[37] and are more likely to die.[38]

Figure 4.32. Recommended hospital care received by Medicare patients with heart attack by gender, 2002-2003



Source: Centers for Medicare & Medicaid Services, Medicare Quality Improvement Organization program, 2002-2004.

Denominator: Medicare beneficiaries hospitalized for heart attack.

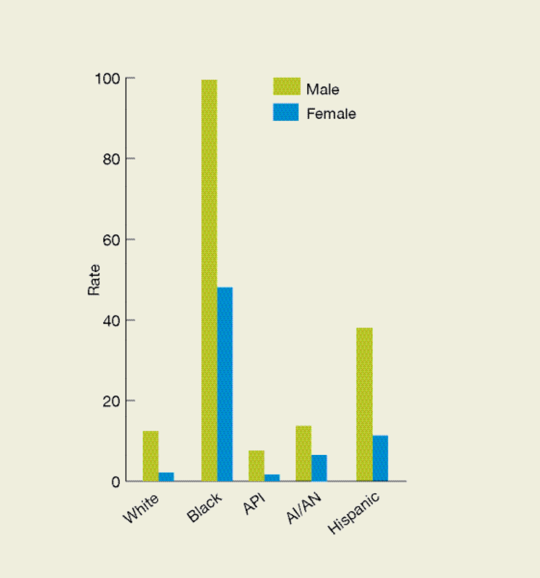
Note: Composite is calculated by averaging the percentage of the population that received each of the six incorporated components of care. See Chapter 1, Introduction and Methods, for composite details.

- In 2002 and 2003, the percentage of Medicare patients with heart attack receiving recommended hospital care was significantly lower among females compared with males (Figure 4.32). In 2004, this disparity was eliminated.
- From 2002 to 2004, the percentage of Medicare patients with heart attack receiving recommended hospital care increased significantly for both females and males.

Management: New AIDS Cases

Although differences in developing AIDS does not necessarily translate into differences in quality of care, early and appropriate treatment of HIV disease can delay progression to AIDS. Improved management of chronic HIV disease has likely contributed to declines in new AIDS cases.

Figure 4.33. Number of new AIDS cases per 100,000 population age 13 and over, by race/ethnicity, stratified by gender, 2004



Key: API=Asian or Pacific Islander; AI/AN=American Indian or Alaska Native.

Source: HIV/AIDS Reporting System, 2004.

Reference population: U.S. population age 13 and over.

Note: The source categorizes race/ethnicity as a single item. White=non-Hispanic White; Black=non-Hispanic Black.

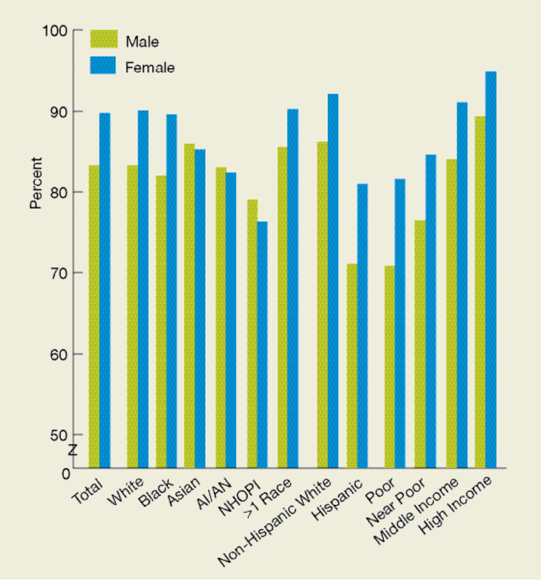
- For all populations, the rate of new AIDS cases for males is more than double that for females (Figure 4.33).
- Among males, the rate of new AIDS cases for Hispanics is more than triple that for Whites, and the rate for Blacks is more than 8 times that for Whites.
- Among females, the rate of new AIDS cases for Hispanics is more than 5 times that for Whites, the rate for AI/ANs is more than triple that for Whites, and the rate for Blacks is more than 22 times that for Whites.
- No group has accomplished the Healthy People 2010 target of 1.0 new AIDS case per 100,000 population.

Access to Health Care

Usual Source of Care

Higher costs, poorer outcomes, and greater disparities are observed among individuals without a usual source of care.[39]

Figure 4.34. Persons with a specific source of ongoing care by race, ethnicity, and income, stratified by gender, 2004



Key: AI/AN= American Indian or Alaska Native, NHOPI= Native Hawaiian or Other Pacific Islander.

Source: National Health Interview Survey, 2004.

Reference Population: Civilian noninstitutionalized population, all ages.

Notes: Measure is age adjusted to the 2000 standard population.

- The proportion of females with a specific source of ongoing care was significantly higher than the proportion of males for the total U.S. population; it was also significantly higher for White, Black, non-Hispanic White, and Hispanic females and females of all income levels (Figure 4.34) compared with their male counterparts.
- For both males and females, the proportion of persons with a source of ongoing care was significantly lower among Hispanics compared with non-Hispanic Whites and among poor, near poor, and middle income persons compared with high income persons.
- For females, the proportion with a source of ongoing care was significantly lower among Asians and AI/ANs compared with Whites, and among Hispanics compared with non-Hispanic Whites. Significant differences by race were not observed among males.

Children

Children comprise 26% of the U.S. population, or 72.3 million people.[40] Racial and ethnic minorities account for almost 40% of all children.[41] In 2003,17% of children lived in families with incomes below the Federal poverty level.[1]

In 2003, Black children and AI/AN children had death rates about 1.5 to 2 times higher than White children. Black infants were more than twice as likely as White infants to die during their first year. Life expectancy at birth was 78 years for White children and 72.8 years for Black children, a difference of about 6%.[42]

Many measures of relevance to children are tracked in the NHDR. Findings presented here highlight seven quality measures and two access measures of particular importance to children:

Component of health care need:	**Measure:**
Prevention	Vaccinations, counseling about overweight/healthy eating, vision care
Treatment	Hospital admissions for pediatric gastroenteritis
Management	Hospital admissions for pediatric asthma
Timeliness	Care for illness or injury as soon as wanted
Patient centeredness	Patient experience of care
Access to care	Health insurance, mental health care

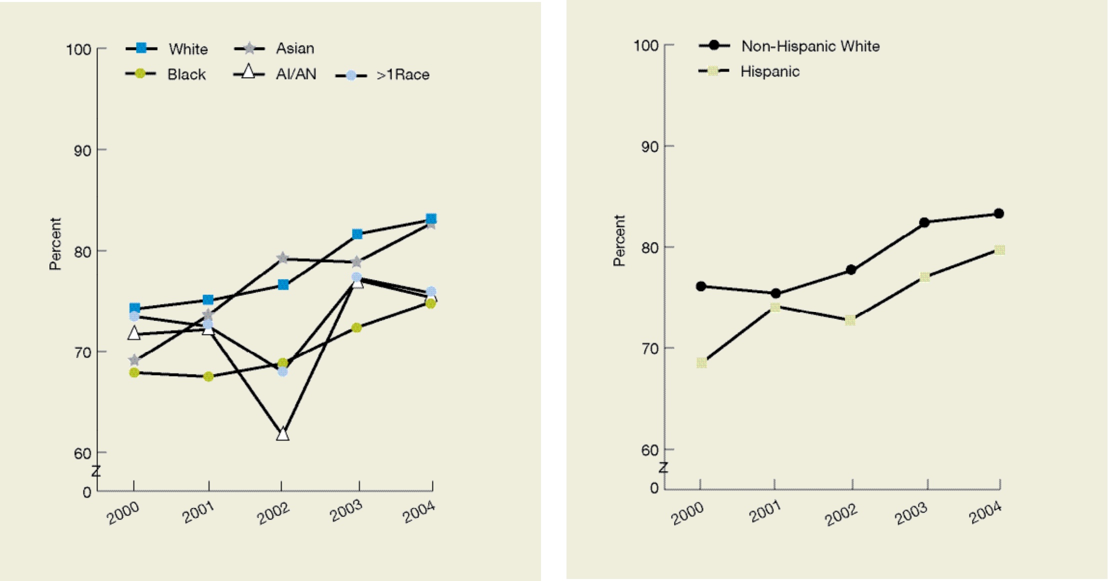
In addition, the final section of this chapter, which discusses individuals with special health care needs, includes findings related to children with special health care needs.

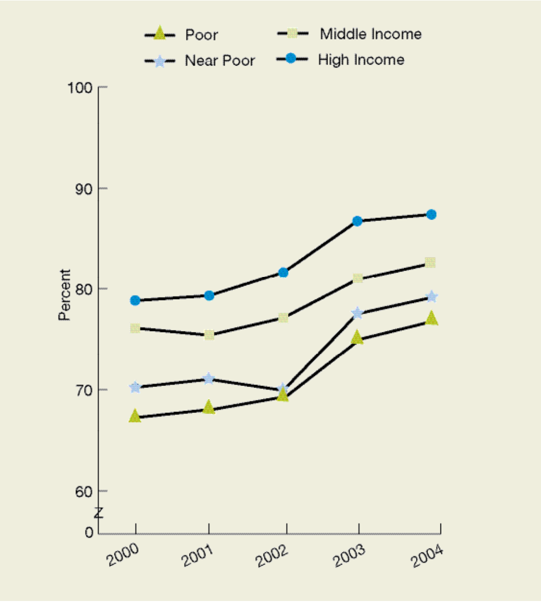
Quality of Health Care

Prevention: Vaccinations

Childhood vaccinations protect recipients from illness and disability and protect others in the community who cannot be vaccinated, such as people who are immunosuppressed. They are important for reducing mortality and morbidity in populations.

Figure 4.35. Children age 19-35 months who received all recommended vaccines by race (top left), ethnicity (top right), and income (bottom left), 2000-2004





Key: AI/AN = American Indian or Alaska Native.

Source: National Immunization Survey, 2000-2004.

Reference population: Civilian noninstitutionalized population ages 19-35 months.

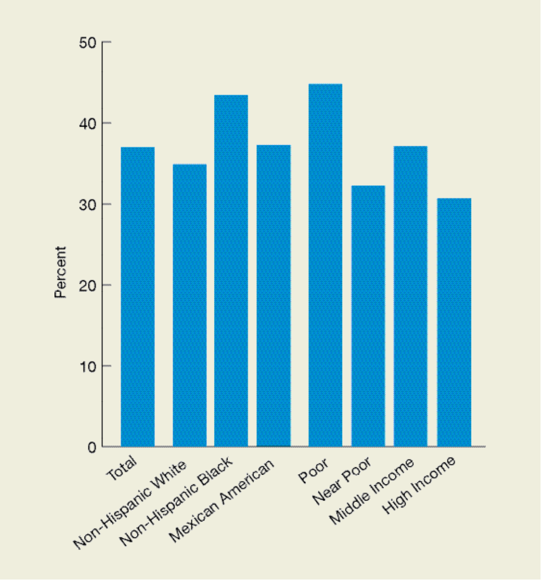
Note: Recommended vaccines for children 19-35 months include 4 doses of diphtheria, tetanus, and pertussis vaccine; 3 doses of polio vaccine; 1 dose of measles, mumps and rubella vaccine; 3 doses of *H. influenzae* type B vaccine; and 3 doses of hepatitis B vaccine.

- In all 5 years, the proportion of children who received all recommended vaccines was significantly lower among Black compared with White children; Hispanic compared with non-Hispanic White children; and poor, near poor, and middle income compared with high income children (Figure 4.35).
- Between 2000 and 2004, receipt of all recommended vaccines improved significantly among White, Black, Asian, and Hispanic children and among children from every income level.
- Only White, Asian, non-Hispanic White, middle income, and high income children achieved the Healthy People 2010 goal of 80% of children receiving all recommended vaccines (Figure 4.35).

Prevention: Counseling About Overweight

Childhood overweight poses a risk for other health problems and influences adult obesity. Lack of awareness is a key problem. Addressing childhood overweight begins with measuring the height and weight of all children and counseling those who are overweight.

Figure 4.36. Overweight children and adolescents ages 2-19 that were told by a doctor or health professional that they were overweight, 1999-2002



Source: National Health and Nutrition Examination Survey, 1999-2002.

Reference population: Overweight civilian noninstitutionalized population ages 2-19.

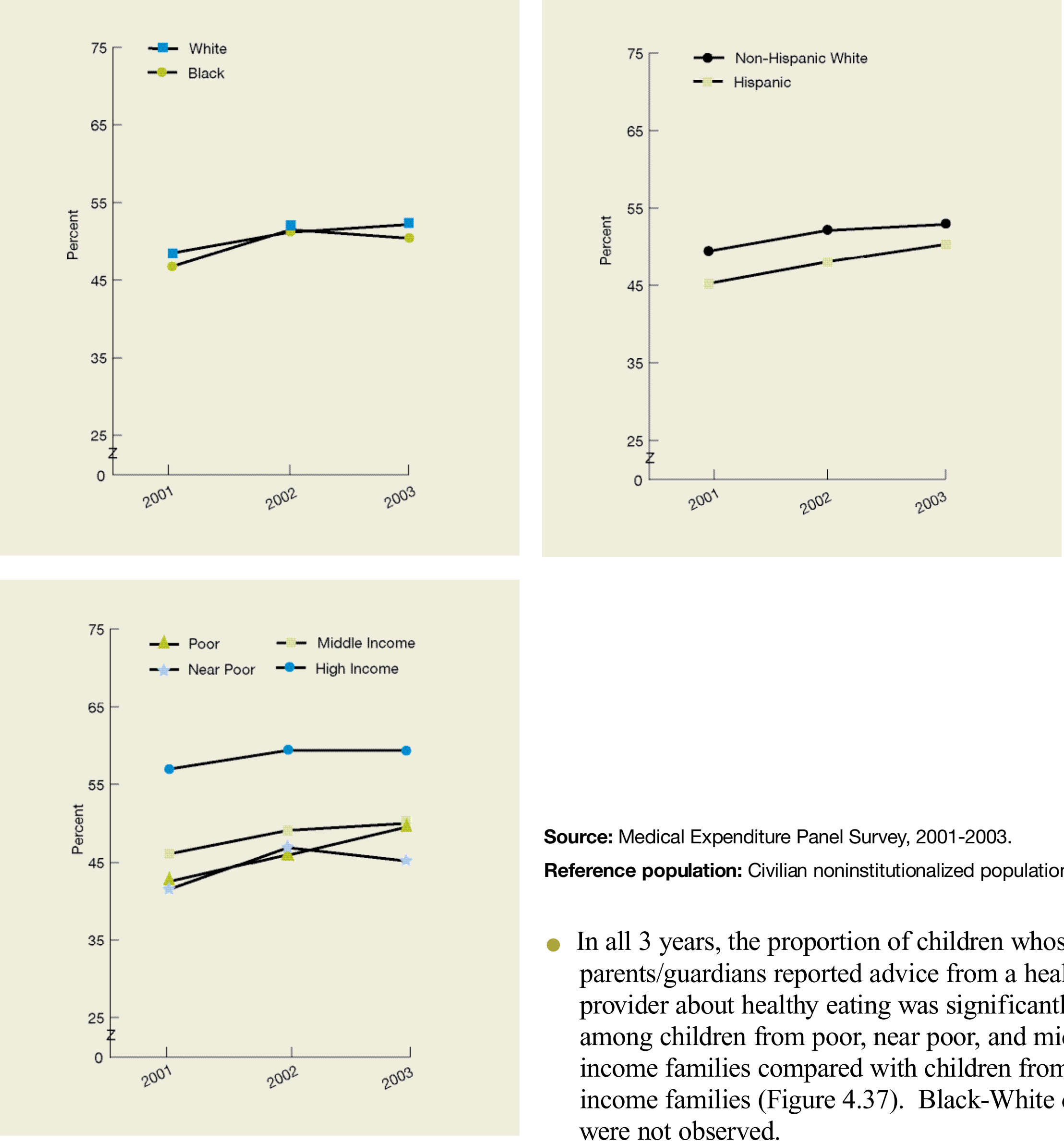
Note: "Mexican Americans" are shown in place of Hispanics because this is how data are collected by the data source.

- In sum, 37.0% of children ages 2 to 19 that are overweight have been told by a health care provider that they are overweight (Figure 4.36).
- No statistically significant differences between populations are observed, although this may be due to small sample size.

Prevention: Counseling About Healthy Eating

Unhealthy eating and lack of physical activity contribute to overweight in children. Routine promotion of healthy eating among children is widely recommended and may help to form eating habits that will last into adulthood, thereby influencing better long-term health.

Figure 4.37. Children ages 2-17 whose parents/guardians reported advice from a doctor or other health provider about healthy eating by race (top left), ethnicity (top right), and income (bottom left), 2001-2003



Source: Medical Expenditure Panel Survey, 2001-2003.

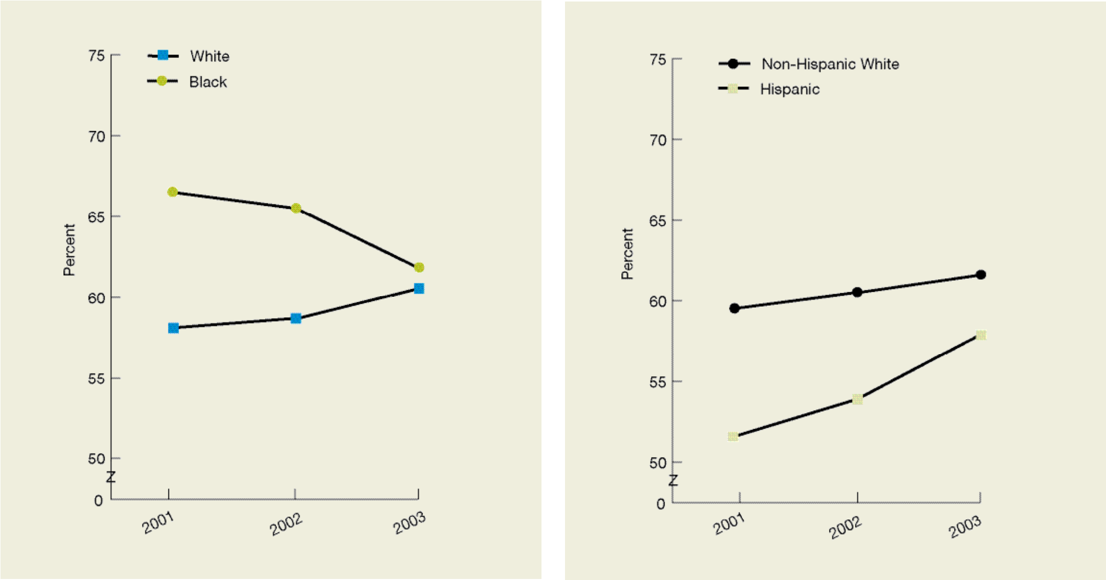
Reference population: Civilian noninstitutionalized population ages 2-17.

- In all 3 years, the proportion of children whose parents/guardians reported advice from a health provider about healthy eating was significantly lower among children from poor, near poor, and middle income families compared with children from high income families (Figure 4.37). Black-White disparities were not observed.
- In 2002 the proportion was also significantly lower among Hispanics compared with non-Hispanic Whites, but in 2003 this disparity was eliminated.
- From 2001 to 2003, the proportion of children getting advice about healthy eating increased significantly for the total population (data not shown) and among Whites, Hispanics, and the poor.

Prevention: Vision Care

Vision checks for children can help to detect eye problems early and, in some cases, improve the chances that corrective treatments will be prescribed and successful.

Figure 4.38. Children ages 3-6 with a vision check, by race (top left), ethnicity (top right), and family income (bottom left), 2001-2003



Source: Medical Expenditure Panel Survey, 2001-2003.

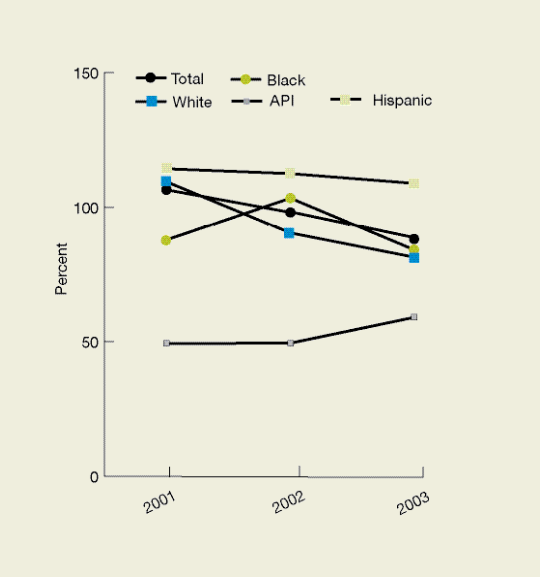
Reference population: Civilian noninstitutionalized population ages 3-6.

- In 2001 and 2002, the proportion of children with a vision check was significantly higher among Black compared with White children; the proportion was significantly lower among Hispanic compared with non-Hispanic White children, and among children from poor and middle income families compared with children from high income families (Figure 4.38). In 2003 these disparities were no longer statistically significant.
- From 2001 to 2003, the rate among Black children appeared to decline. However, changes in the proportion of children with a vision check were not statistically significant for any group due to small sample sizes.
- In all 3 years, the proportion of children with a vision check was significantly lower among children from near poor compared with high income families.

Treatment: Hospital Admissions for Pediatric Gastroenteritis

Pediatric gastroenteritis can develop into a life-threatening condition due to dehydration, especially among infants. Proper outpatient treatment of gastroenteritis may prevent hospitalization, and lower hospitalization rates may reflect access to better quality care.

Figure 4.39. Hospital admissions for gastroenteritis per 100,000 population age 0-17 by race/ethnicity, 2001-2003



Key: API=Asian or Pacific Islander.

Source: HCUP State Inpatient Databases disparities analysis file, 2001-2003.

Denominator: Children ages 0-17.

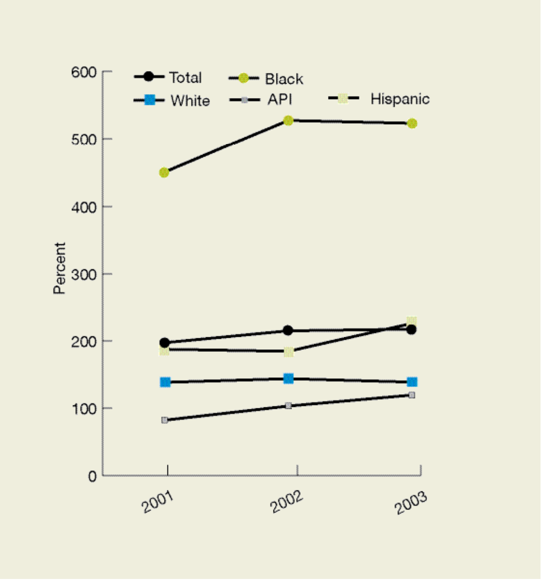
Note: White, Black, and API are non-Hispanic groups.

- In both 2001 and 2002, admissions for pediatric gastroenteritis were significantly lower among API children compared with White children; by 2003, this difference was no longer statistically significant (Figure 4.39).
- In 2003, admissions were significantly higher among Hispanic children compared with White children.
- From 2001 to 2003, admissions for pediatric gastroenteritis declined significantly for the total population and Whites and did not change significantly for any other group.

Management: Hospital Admissions for Pediatric Asthma

A disproportionate number of children have asthma. The prevalence rate for children age 0-17 is 83 per 1,000 while the prevalence rate for adults age 18 and older is 68 per 1,000.[43] Emergency room visit rates for asthma are highest among children age 0-4 (62 per 10,000 population). Proper outpatient treatment of asthma may prevent hospitalization, and lower hospitalization rates may reflect access to better quality care.[x]

Figure 4.40. Pediatric asthma admission rate per 100,000 population, by race/ethnicity, 2001-2003



Key: API=Asian or Pacific Islander.

Source: HCUP State Inpatient Databases disparities analysis file, 2001-2003.

Denominator: Children ages 0-17.

Note: White, Black, and API are non-Hispanic groups.

- In 2001 and 2002 the rate of asthma admissions was significantly higher among Black children and significantly lower among API children compared with White children (Figure 4.40).
- In 2003 the rate was significantly higher among Black and Hispanic children compared with White children, but the difference between API and White children had been eliminated.
- From 2001 to 2003, the rate of pediatric asthma admissions did not change significantly for any group.
- No population achieved the Healthy People 2010 target of 17.3 pediatric asthma admissions per 10,000 population ages 0-17.

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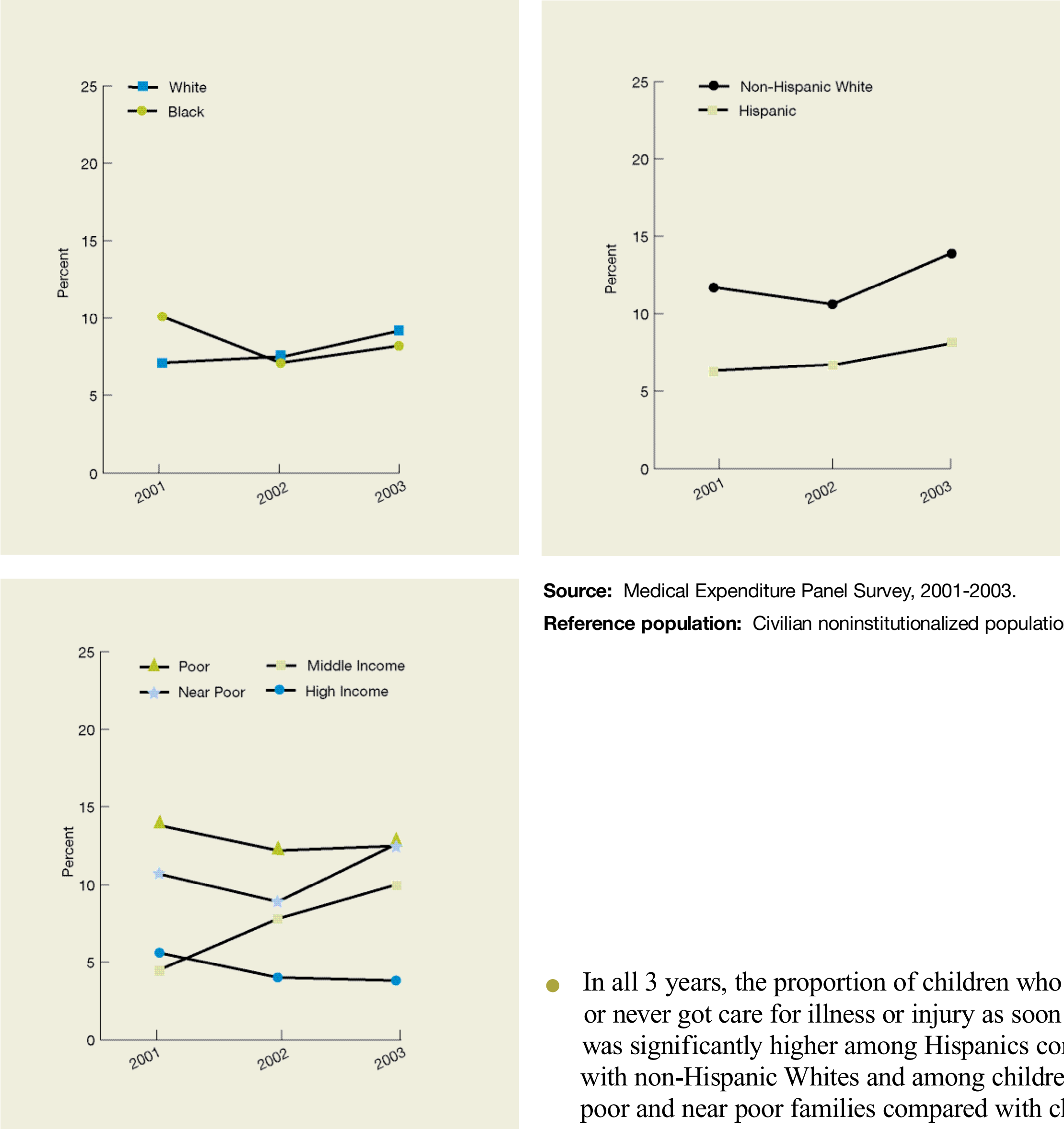
[x] It should be noted that higher rates of pediatric asthma hospital admissions among Blacks compared with Whites may be partially attributable to higher asthma prevalence in Blacks.

Timeliness: Care for Illness or Injury As Soon As Wanted

Children often need care for illness or injury. Timely receipt of health care can prevent disease complications, alleviate discomfort, and reduce child and parental anxiety.

Figure 4.41. Children whose parents or guardians reported that their child sometimes or never got care for illness or injury as soon as wanted in the past year, by race (top left), ethnicity (top right), and income (bottom left), 2001-2003



Source: Medical Expenditure Panel Survey, 2001-2003.

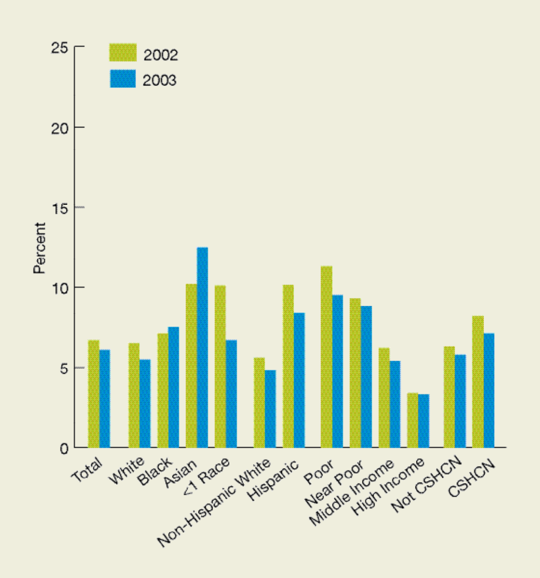
Reference population: Civilian noninstitutionalized population ages 0-17.

- In all 3 years, the proportion of children who sometimes or never got care for illness or injury as soon as wanted was significantly higher among Hispanics compared with non-Hispanic Whites and among children from poor and near poor families compared with children from high income families (Figure 4.41).
- In 2002 and 2003 the proportion was also significantly higher among children from middle income families compared with children from high income families.
- From 2001 to 2003, the proportion of children who sometimes or never got care for illness or injury as soon as wanted increased significantly for Whites and children from middle income families and did not change significantly for any other group.

Patient Centeredness: Patient Experience of Care

Patient centeredness "encompasses qualities of compassion, empathy, and responsiveness to the needs, values, and expressed preferences of the individual patient."[44] Patient centered care is supported by good patient-provider communication so that patients' needs and wants are understood and addressed and patients understand and participate in their own care.[45, 46, 47, 48] Childhood presents a unique opportunity to promote health through preventive and routine care, identify health problems early, and establish healthy lifestyle behaviors. Communication in children's health care can pose a particular challenge as children are often less able to express their health care needs and preferences, and a third party (i.e., a parent or guardian) is involved in communication and decisionmaking. Optimal communication in children's health care can therefore have a significant impact on receipt of high quality care and subsequent health status. This is especially true for children with special health care needs (CSHCN).

Figure 4.42. Children less than 18 years of age whose parents or guardians reported that their child's health providers sometimes or never listened carefully, explained things clearly, respected what they had to say, and spent enough time with them, by race, ethnicity, income, and special health care needs, 2002 and 2003



Key: CSHCN = children with special health care needs.

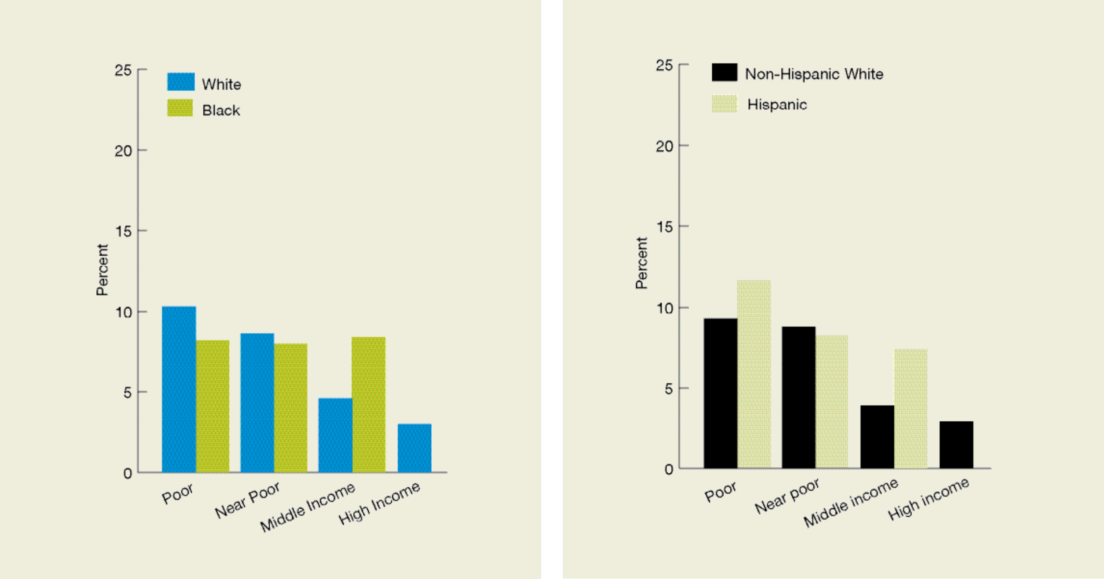
Source: Medical Expenditure Panel Survey, 2002 and 2003.

Denominator: Civilian noninstitutionalized population ages 0-17.

- In both years, the proportion of children whose parents or guardians reported that their child's health providers sometimes or never listened carefully, explained things clearly, respected what they had to say, or spent enough time with them was significantly higher among Hispanics compared with non-Hispanic Whites and among poor, near poor, and middle income persons compared with high income persons (Figure 4.42).
- In 2002 the proportion of children whose parents or guardians reported poor communication was significantly higher among children with special health care needs compared with children without special health care needs; in 2003, this difference was eliminated.
- From 2002 to 2003, the proportion of children whose parents or guardians reported poor communication decreased significantly among Whites and non-Hispanic Whites.

Racial and ethnic minorities are disproportionately of lower socioeconomic status.[34] To distinguish the effects of race, ethnicity, and income on patient-provider communication in children's care, this measure is stratified by income.

Figure 4.43. Children less than 18 years of age whose parents or guardians reported that their child's health providers sometimes or never listened carefully, explained things clearly, respected what they had to say, and spent enough time with them by race (left) and ethnicity (right), stratified by income, 2003



Source: Medical Expenditure Panel Survey, 2003.

Denominator: Civilian noninstitutionalized population ages 0-17.

Note: Sample sizes were too small to provide estimates for Blacks and Hispanics with high incomes.

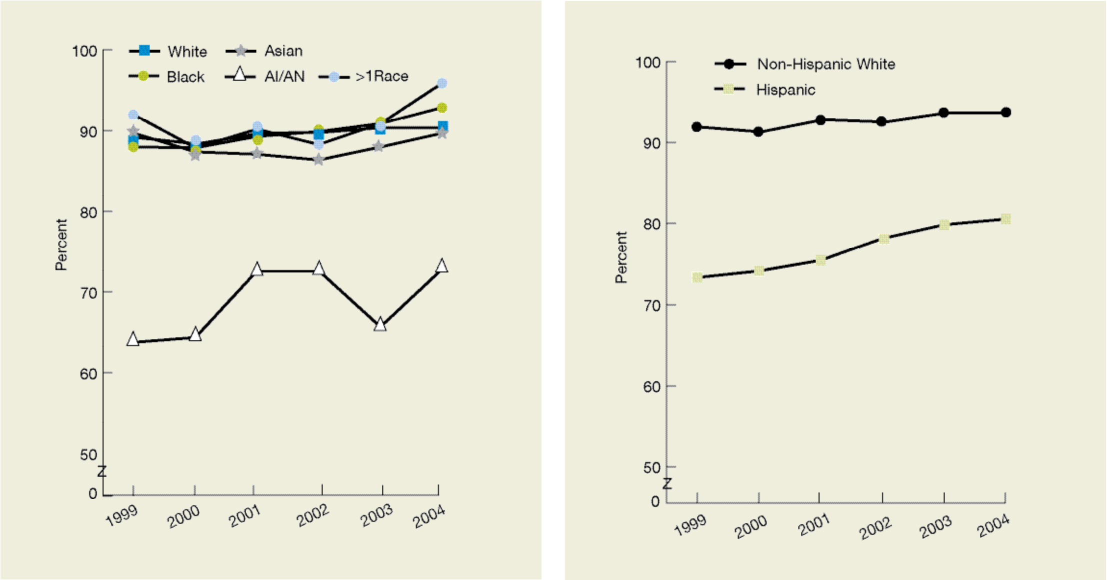
- Income explains some but not all of the differences in patient-provider communication among different ethnicities.
- Parents or guardians of middle income Hispanic children were significantly more likely than parents or guardians of middle income non-Hispanic White children to report poor patient-provider communication (Figure 4.43).

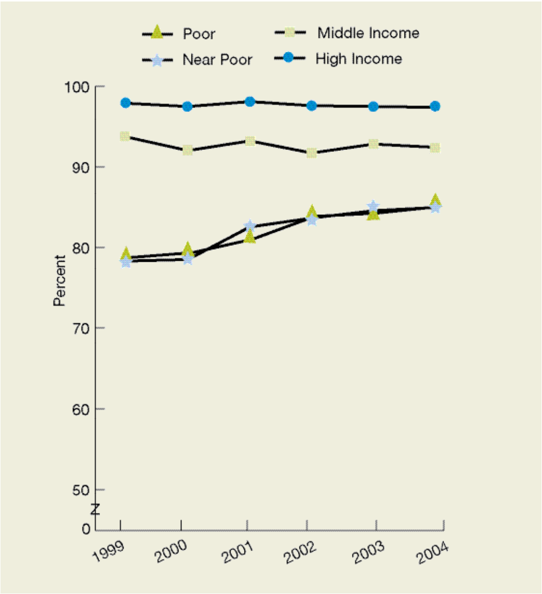
Access to Health Care

Health Insurance

Insurance coverage is among the most important factors in access to health care. Special efforts have been made to provide insurance coverage to children.[49]

Figure 4.44. Children age 0-17 with health insurance, by race (top left), ethnicity (top right), and family income (bottom left), 1999-2004





Key: AI/AN=American Indian or Alaska Native.

Source: National Health Interview Survey, 1999-2004.

Reference population: Civilian noninstitutionalized population ages 0-17.

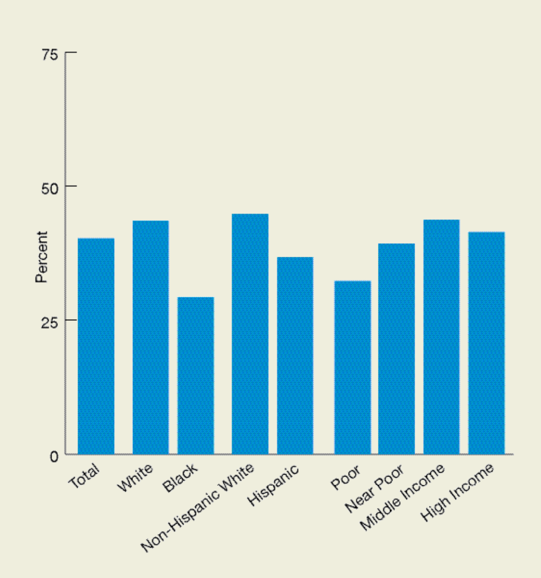
Note: Insurance status is determined at the time of interview. Children are considered uninsured if they lack private health insurance, public assistance (including the State Children's Health Insurance Program), Medicare, Medicaid, a State-sponsored health plan, other government-sponsored programs, a military health plan, or if their only coverage is through the Indian Health Service.

- In all 6 years, the proportion of children with health insurance was significantly lower among AI/AN children compared with White children; among Hispanic children compared with non-Hispanic White children; and among poor, near poor, and middle income children compared with high income children (Figure 4.44). In 2004 the proportion of children with health insurance was significantly higher among Black children and children of multiple races compared with White children.
- From 1999 to 2004, the overall rate of health insurance among children improved from 88.1% to 90.8%. Significant improvements were observed among White, Black, multiple race, non-Hispanic White, and Hispanic children, and among children from poor and near poor families. This may reflect the implementation of the State Children's Health Insurance Program (SCHIP) in 1998.

Mental Health Care

The prevalence of mental disorders for racial and ethnic minorities in the United States is similar to that for Whites,[50] but minorities have less access to mental health care and are less likely to receive needed services.[51] These differences may reflect, in part, variation in preferences and cultural attitudes toward mental health and mental health care.

Figure 4.45. Children ages 12-17 with a major depressive episode in the past year who received treatment in the past year by race, ethnicity, and family income, 2004



Source: SAMHSA National Survey on Drug Use and Health, 2004.

Reference population: U.S. population ages 12-17 with a major depressive episode in the past year.

- The proportion of children ages 12-17 with a major depressive episode who received treatment for depression in the past year was significantly lower among Blacks compared with Whites; among Hispanics compared with non-Hispanic Whites; and among children from poor families compared with children from high income families (Figure 4.45).

Elderly

Over 35 million persons age 65 and over reside in the United States, accounting for 1 in every 8 Americans. Further, the proportion of the population that is over age 65 is swiftly increasing: by the year 2030, the elderly population is projected to more than double to 71.5 million. The past century has seen significant increases in life expectancy, and 65-year-olds today can expect to live an additional 18.1 years. Nonetheless, the elderly face greater health care difficulties than younger populations. In 2003, 38.6% of noninstitutionalized older persons assessed their health as excellent or very good compared with two-thirds of persons ages 18-64, and the majority of older persons have at least one chronic condition.

Older women outnumber older men by nearly a third. Members of minority groups are projected to represent over one-quarter of the elderly in 2030, up from about 16% in 2000. About 3.6 million elderly lived below the poverty level in 2002, corresponding to a poverty rate of over 10%. Another 2.2 million, or more than 6% of the elderly, were classified as near poor, with incomes between 100% and 125% of the Federal poverty level.[52]

The Medicare program provides core health insurance to nearly all elderly Americans and reduces many financial barriers to acute and postacute care services. The Medicare Prescription Drug Improvement and Modemization Act of 2003 adds new prescription drug and preventive benefits to Medicare and provides extra financial help to persons with low incomes. Consequently, differences in access to and quality of health care tend to be smaller among Medicare beneficiaries than among younger populations.

Surveys of the general population often do not include enough elderly to examine racial, ethnic, or socioeconomic differences in health care. Consequently, the NHDR relies upon data from the Medicare Current Beneficiary Survey to examine disparities in access to and quality of care. Findings presented here highlight two quality measures and one access measure of particular importance to the elderly:

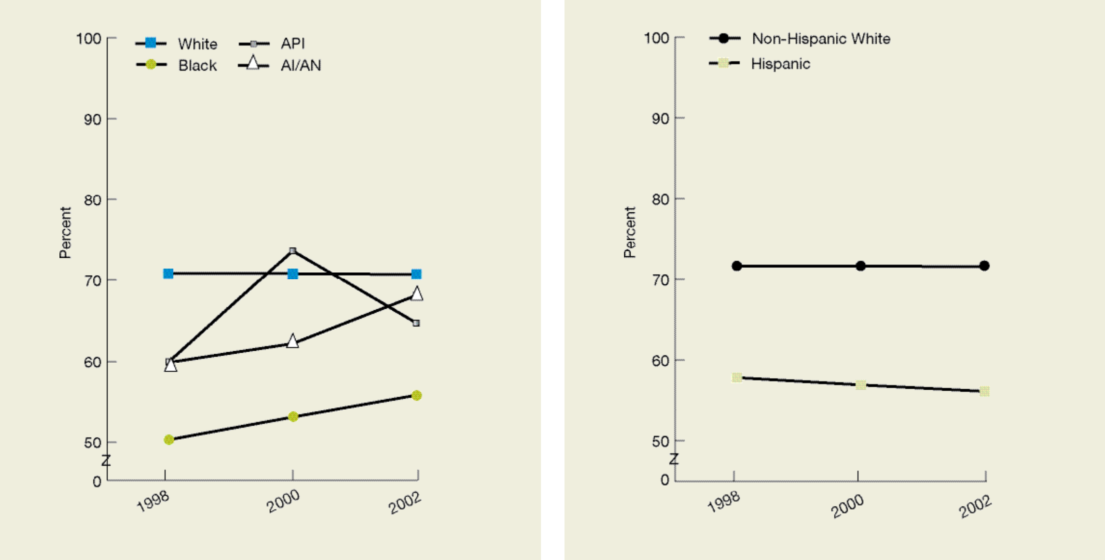
Component of health care need:	**Measure:**
Prevention	Influenza vaccination, vision care
Access to care	Delayed care due to cost

Quality of Health Care

Prevention: Influenza Vaccination

Influenza is responsible for significant morbidity and decreased productivity during outbreaks. Elderly persons are at increased risk for complications from influenza infections. Vaccination is an effective strategy to reduce illness and deaths due to influenza, and annual influenza vaccination of all elderly individuals is recommended by the U.S. Preventive Services Task Force and the Centers for Disease Control and Prevention.

Figure 4.46. Elderly Medicare beneficiaries with influenza vaccination in the past year by race (top left), ethnicity (top right), and income (bottom left), 1998, 2000, and 2002



Key: AI/AN=American Indian or Alaska Native; API=Asian or Pacific Islander.

Source: Medicare Current Beneficiary Survey, 1998, 2000, 2002.

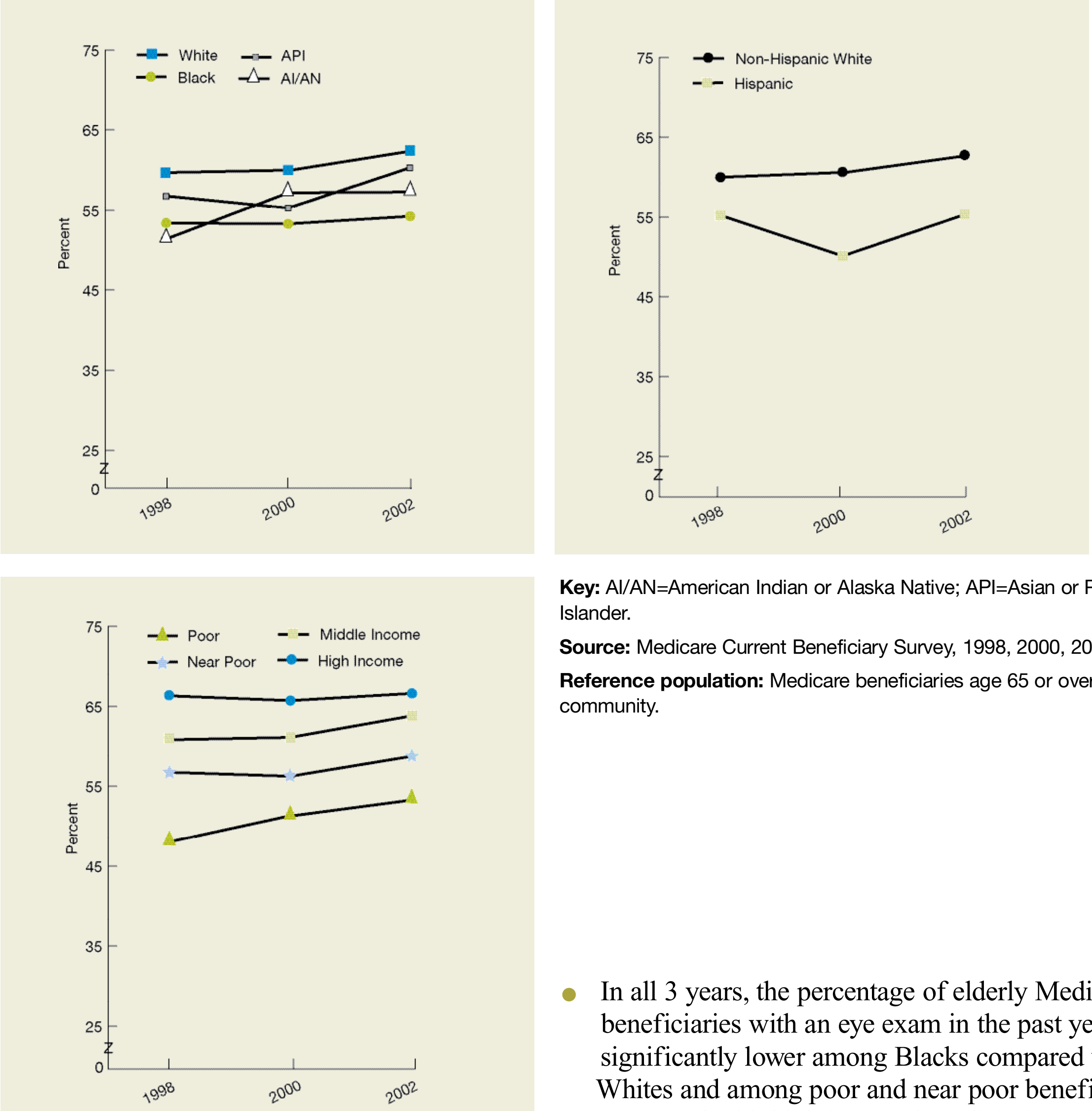
Reference population: Medicare beneficiaries age 65 or over living in the community.

- In all 3 years, the percentage of elderly Medicare beneficiaries with influenza vaccination in the past year was significantly lower among Blacks compared with Whites; among Hispanics compared with non-Hispanic Whites; and among poor, near poor, and middle income beneficiaries compared with high income beneficiaries (Figure 4.46). In 1998, the percentage was also significantly lower among APIs compared with Whites.
- From 1998 to 2002, the percentage improved among Blacks but did not change significantly for any other population group.
- In 2002, the Healthy People 2010 target of 90% of elderly Americans with influenza vaccination was not achieved by any population group.

Prevention: Vision Care

Visual impairment is a common and potentially serious problem among older people. Personal safety may be compromised as risks of falls and car accidents are increased. Because eye problems are often not recognized by the elderly, the U.S. Preventive Services Task Force recommends routine vision screening.

Figure 4.47. Elderly Medicare beneficiaries with an eye exam in the past year by race (top left), ethnicity (top right), and income (bottom left), 1998, 2000, 2002



Key: AI/AN=American Indian or Alaska Native; API=Asian or Pacific Islander.

Source: Medicare Current Beneficiary Survey, 1998, 2000, 2002.

Reference population: Medicare beneficiaries age 65 or over living in the community.

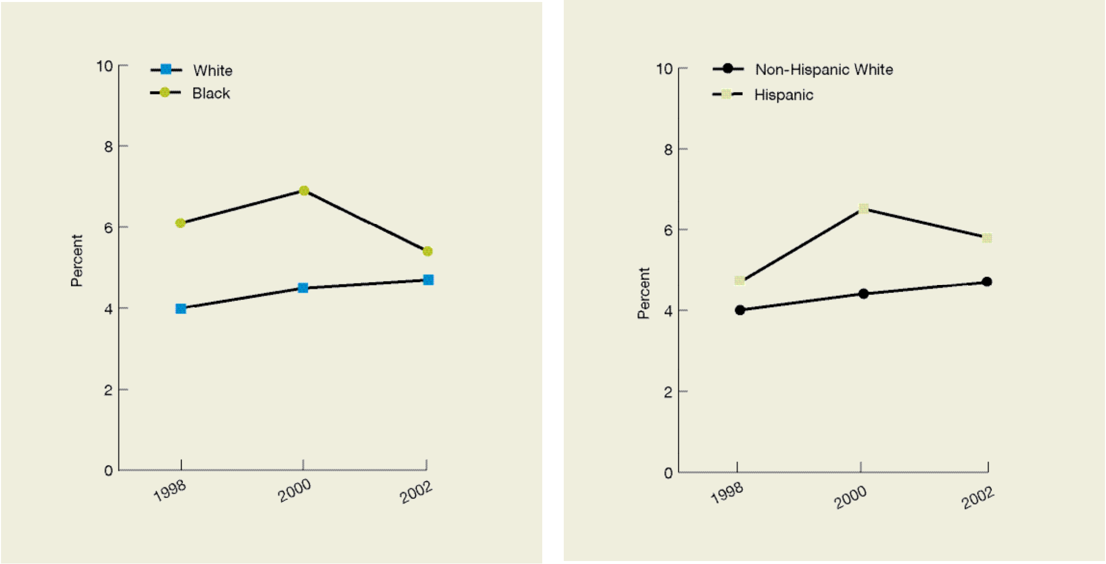
- In all 3 years, the percentage of elderly Medicare beneficiaries with an eye exam in the past year was significantly lower among Blacks compared with Whites and among poor and near poor beneficiaries compared with high income beneficiaries (Figure 4.47).
- In 2 of the 3 years, the percentage with an eye exam was also significantly lower among Hispanics compared with non-Hispanic Whites and among middle income beneficiaries compared with high income beneficiaries.
- From 1998 to 2002, the percentage of elderly Medicare beneficiaries with an eye exam within the previous year improved significantly overall and among Whites, non-Hispanic Whites, and the poor.

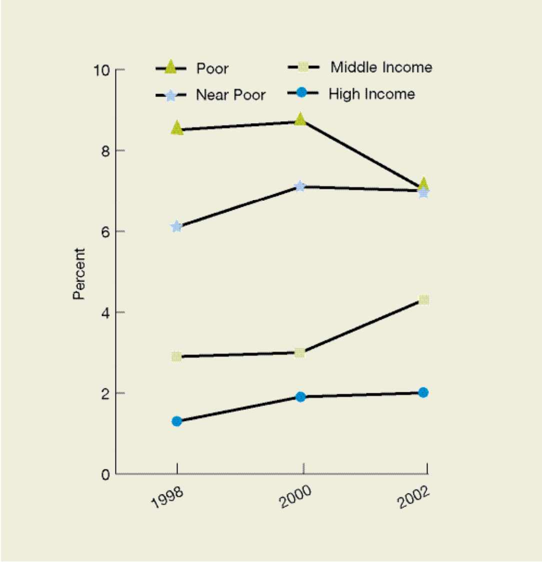
Access to Health Care

Delayed Care Due to Cost

Timely delivery of appropriate care has been shown to improve health care outcomes and reduce health care costs. Timely receipt of care is especially important for the elderly due to the often increased medical needs of this population. Delayed health care can lead to diagnosis at more advance disease stage and reduce opportunities for optimal treatment.[xi]

Figure 4.48. Elderly Medicare beneficiaries who delayed health care due to cost by race (top left), ethnicity (top right), and income (bottom left), 1998, 2000, and 2002





Source: Medicare Current Beneficiary Survey, 1998, 2000, 2002.

Reference population: Medicare beneficiaries age 65 or over living in the community.

- In all 3 years, the percentage of elderly Medicare beneficiaries who delayed care due to cost was significantly higher among poor, near poor, and middle income beneficiaries compared with high income beneficiaries (Figure 4.48).
- In 1998, the percentage was also significantly higher among Blacks compared with Whites.
- From 1998 to 2002, the percentage of elderly Medicare beneficiaries who delayed care due to cost rose significantly among middle income beneficiaries but did not change significantly for any other population.

[xi] In this measure, delayed care due to cost is self-reported by patients.

Residents of Rural Areas

About 1 in 5 Americans lives in a nonmetropolitan area.[53] Compared with their urban counterparts, rural residents are more likely to be elderly, poor,[54] in fair or poor health, and to have chronic conditions.[54] Rural residents are less likely to receive recommended preventive services and report, on average, fewer visits to health care providers.[55]

Although 20% of Americans live in rural areas,[xii] only 9% of physicians in America practice in those settings.[56] Multiple programs help to deliver needed services in rural areas, such as the National Health Service Corps Scholarship Program, Rural Hospital Flexibility Grant Program, Small Rural Hospital Improvement Grant Program, Rural Health Outreach Grant Program, Indian Health Service, State offices of rural health, rural health clinics, and community health centers. Nurse practitioners, nurse midwives, and physician assistants also help to deliver care.

Many rural residents depend on small rural hospitals for their care. There are approximately 2,000 rural hospitals throughout the country, 1,500 of which have 50 or fewer beds. Most of these hospitals are critical access hospitals which have fewer than 25 beds. Rural hospitals largely provide primary care and chronic disease management. They face unique challenges due to their size and casemix. During the 1980's, many were forced to close because of financial losses;[57] however during the past few years, finances of small rural hospitals have improved.

Transportation needs are also pronounced among rural residents, who face longer distances to reach health care delivery sites. Of the nearly 1,000 "frontier counties"[xiii] in the Nation, most have limited health care services and many do not have any.[58]

Many measures of relevance to residents of rural areas are tracked in the NHDR. Findings presented here highlight four quality measures and one access measure of particular importance to residents of rural areas:

Component of health care need:	**Measure:**
Prevention	Counseling children about healthy eating
Treatment	Inpatient deaths from heart attack
Management	Hospital admissions for pediatric asthma
Timeliness	Care for illness or injury as soon as wanted
Access to care	Health insurance

[xii] Many terms are used to refer to the continuum of geographic areas. For Census 2000, the Census Bureau's classification of "rural" consists of all territory, population, and housing units located outside of urban areas and urban clusters. The Census Bureau classified as "urban" all territory, population, and housing units located within (a) core census block groups or blocks that have a population density of at least 1,000 people per square mile, and (b) surrounding census blocks that have an overall density of at least 500 people per square mile.

[xiii] "Frontier counties" have a population density of less than 7 persons per square mile; residents travel long distances for care.

As in previous NHDRs, detailed geographic typologies have been applied to two AHRQ databases (MEPS and HCUP) to define variations in health care quality and access for a range of rural and urban locations. Federal definitions of micropolitan and noncore statistical areas (not metropolitan or micropolitan areas) published in June 2003 are used.[59] In addition, Urban Influence Codes are used to subdivide metropolian areas into large and small metropolitan areas. Thus, categories used in this section of the NHDR may be defined as follows:

- Large metropolitan statistical area—Metropolitan area of 1 million or more inhabitants.
- Small metropolitan statistical area—Metropolitan area of fewer than 1 million inhabitants.
- Micropolitan statistical area—Urban area of at least 10,000 but fewer than 50,000 inhabitants.
- Noncore statistical area—Not metropolitan or micropolitan.

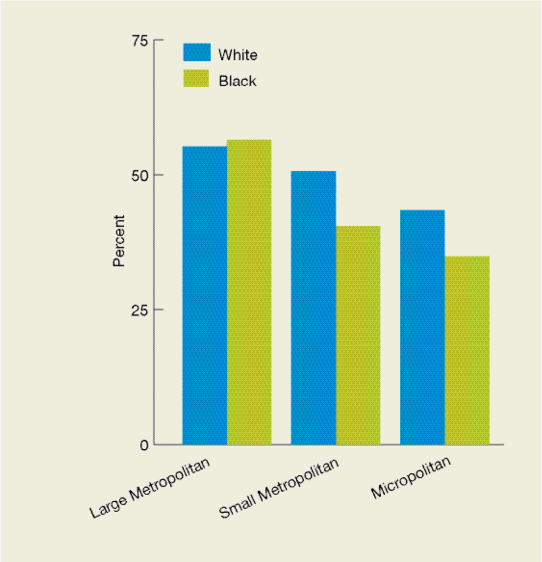
Urban-rural contrasts in this section compare residents of small metropolitan, micropolitan, and noncore statistical areas with residents of large metropolitan statistical areas. Sample sizes are often too small to provide reliable estimates for noncore statistical areas, limiting the ability to assess disparities among residents of these areas.

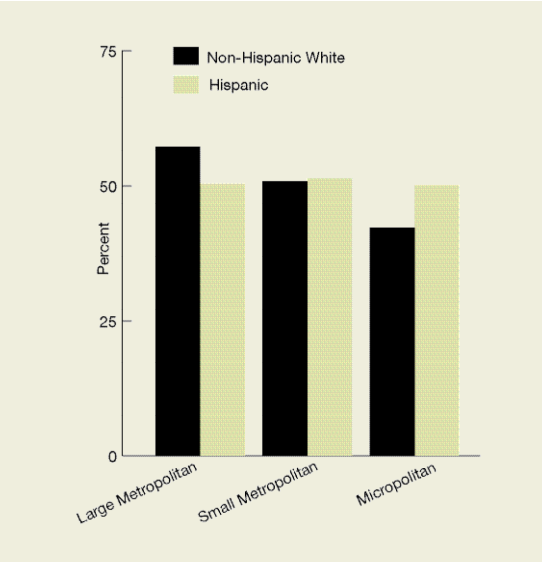
Quality of Health Care

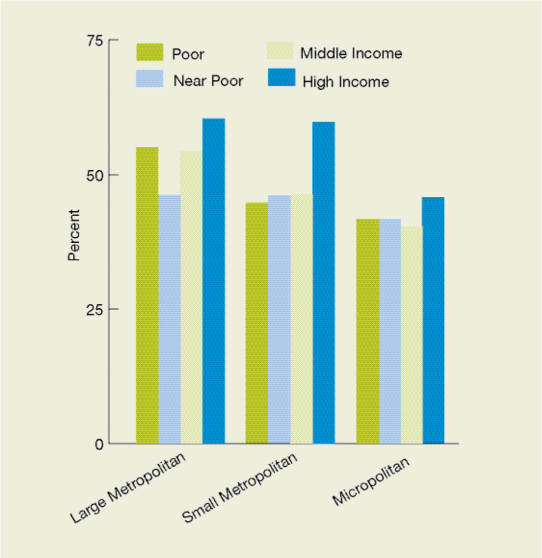
Prevention: Counseling Children About Healthy Eating

Unhealthy eating contributes to overweight and obesity in childhood and an increased risk for other, chronic health problems such as diabetes and cardiovascular disease.

Figure 4.49. Children ages 2-17 whose parents/guardians reported advice from a doctor or other health provider about healthy eating by race (top left), ethnicity (top right), and income (bottom left), stratified by geographic location, 2003







Source: Medical Expenditure Panel Survey, 2003.

Reference population: Civilian noninstitutionalized population ages 2-17.

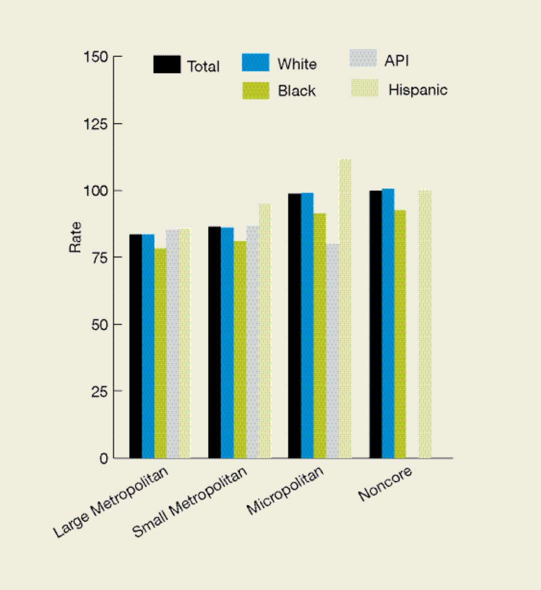
Note: Large metropolitan=metropolitan area ≥1 million inhabitants; small metropolitan=metropolitan area <1 million inhabitants; micropolitan=urban area >10,000 and < 50,000 inhabitants.

- Among children living in large metropolitan areas, the proportion of children whose parents/guardians reported advice from a health provider about healthy eating was significantly lower among Hispanics compared with non-Hispanic Whites and among those from near poor compared with those from high income families (Figure 4.49).
- Among children living in small metropolitan areas, the proportion of children whose parents/guardians reported advice from a health provider about healthy eating was significantly lower among Blacks compared with Whites and among those from poor, near poor, and middle income families compared with those from high income families
- Among children living in micropolitan areas, significant racial disparities were not observed.

Treatment: Inpatient Deaths From Heart Attack

Heart disease is the leading cause of death for both men and women in the United States, responsible for almost 700,000 deaths in 2002. About 1.2 million heart attacks occur each year. Data on inpatient hospital deaths for patients who are admitted for a heart attack (acute myocardial infarction, or AMI) are presented. To distinguish the effects of race/ethnicity on the AMI inhospital mortality rate within urban and rural areas, racial/ethnic data are stratified by urban and rural location of patient residence.

Figure 4.50. Deaths per 1,000 adult admissions with heart attack as principal diagnosis by race/ethnicity and geographic location, 2003



Key: API=Asian or Pacific Islander.

Source: HCUP State Inpatient Databases disparities analysis file, 2003.

Denominator: Adults age 18 and older hospitalized for heart attack in community hospitals.

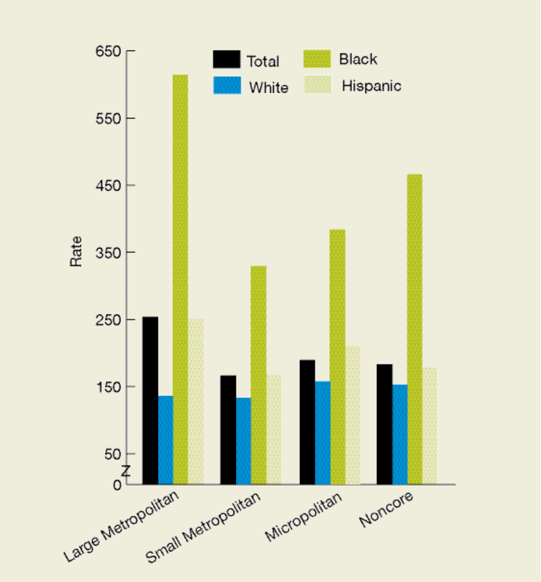
Note: White, Black, and API are non-Hispanic groups. Sample sizes were too small to provide estimates for API residents of noncore areas. Large metropolitan = metropolitan area >1 million inhabitants; small metropolitan = metropolitan area <1 million inhabitants; micropolitan = urban area >10,000 and <50,000 inhabitants; noncore = not metropolitan or micropolitan.

- The overall AMI mortality rate was significantly higher among persons from noncore, micropolitan, and small metropolitan areas compared with persons from large metropolitan areas (Figure 4.50).
- Within type of urban and rural areas, the rate of AMI mortality was significantly lower among Blacks from large metropolitan areas and significantly higher among APIs from small metropolitan areas compared with respective Whites.
- From 2001 to 2003, the rate of AMI mortality decreased significantly for persons from large metropolitan areas (from 93.5 to 83.5 deaths per 1,000 admissions), small metropolitan areas (from 100.3 to 86.4), micropolitan areas (from 105.5 to 98.6), and noncore areas (from 109.6 to 99.9) (data not shown).

Management: Hospital Admissions for Pediatric Asthma

In 2002, over 30 million Americans had been diagnosed with asthma during their lifetime, and over 4,000 Americans died from asthma.[60] A disproportionate number of children have asthma. Geographic location can affect asthma rates; inner city children may be more likely to be exposed to some environmental asthma triggers, such as cockroach antigens and air pollutants. To distinguish the effects of race/ethnicity on pediatric asthma admissions within urban and rural areas, racial/ethnic data are stratified by urban and rural location.

Figure 4.51. Pediatric asthma admissions per 100,000 population by race/ethnicity and geographic location, 2003



Source: HCUP State Inpatient Databases disparities analysis file, 2003.

Denominator: Children ages 0-17.

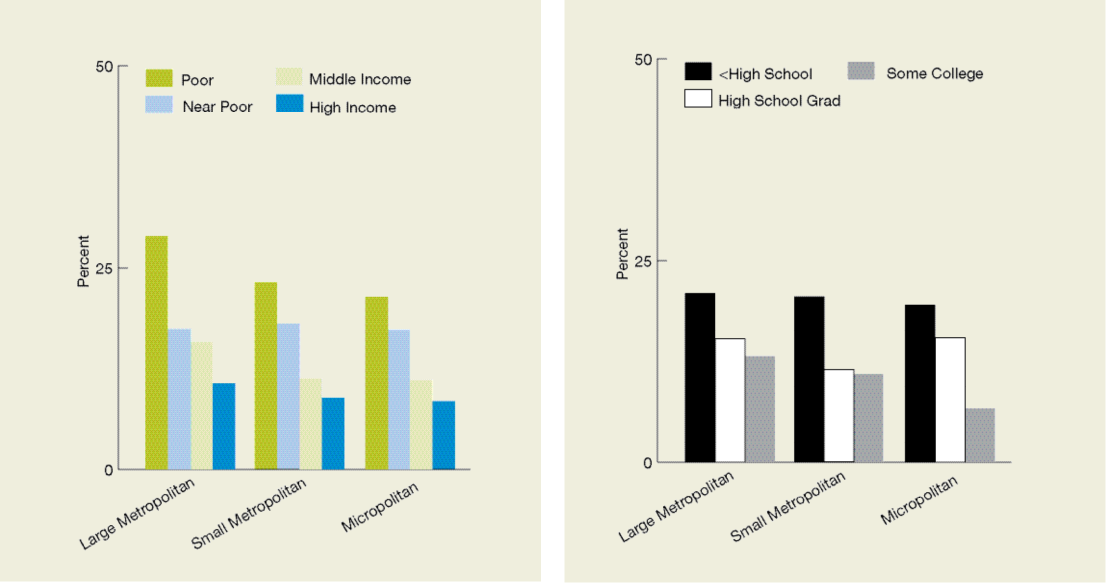
Note: White and Black are non-Hispanic groups. Large metropolitan = metropolitan area ≥1 million inhabitants; small metropolitan = metropolitan area <1 million inhabitants; micropolitan = urban area >10,000 and <50,000 inhabitants; noncore = not metropolitan or micropolitan.

- The total rate of pediatric asthma admissions was significantly lower for persons from every area compared with persons from large metropolitan areas (Figure 4.51).
- Within type of urban and rural areas, the rate of pediatric asthma admissions was significantly higher among Blacks from large metropolitan, small metropolitan, micropolitan, and noncore areas compared with respective Whites and among Hispanics from large metropolitan areas compared with respective Whites.
- From 2001 to 2003, the rate of pediatric asthma admissions did not change significantly for persons from any type of urban or rural areas (i.e., for persons from large metropolitan areas, the rate changed from 226.5 to 254.1 admissions per 100,000 population; for small metropolitan areas, the rate changed from 156.5 to 166.8; for micropolitan areas, the rate changed from 180.2 to 189.5; for noncore areas, the rate changed from 177.1 to 182.8 admissions per 100,000 population) (data not shown).

Timeliness: Care for Illness or Injury As Soon As Wanted

Timely delivery of appropriate care has been shown to improve health care outcomes and reduce health care costs. Furthermore, when patients need or want care, having access to that care improves their health care experience, which may further promote health.

Figure 4.52. Adults who sometimes or never get care for illness or injury as soon as wanted by income (left) and education (right), stratified by geographic location, 2003



Source: Medical Expenditure Panel Survey, 2003.

Reference population: Civilian noninstitutionalized population.

Note: Large metropolitan=metropolitan areas ≥1 million inhabitants; small metropolitan=metropolitan areas <1 million inhabitants; micropolitan=urban area >10,000 and <50,000 inhabitants.

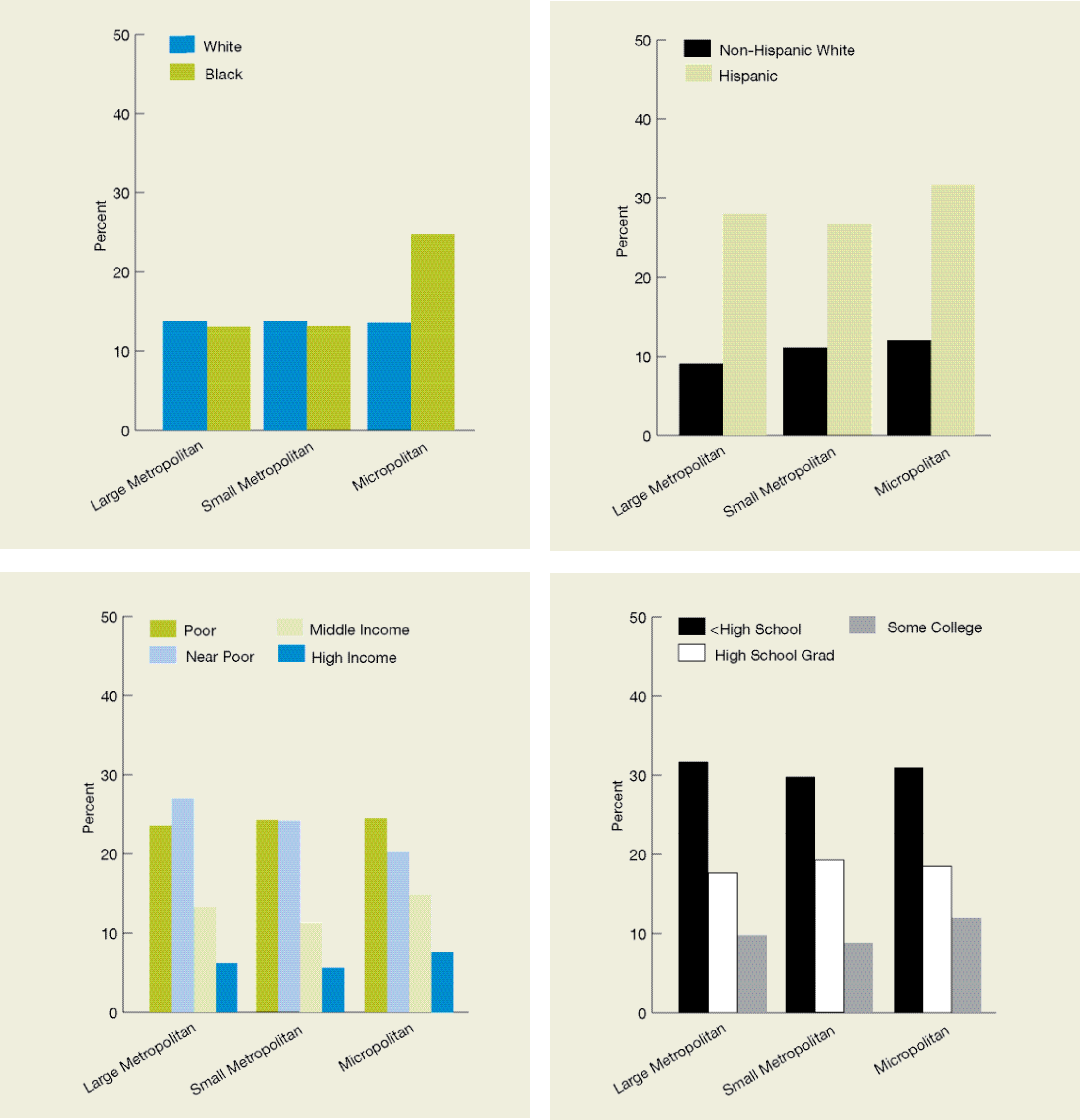
- Across all geographic areas, the proportion of persons who sometimes or never get care for illness or injury as soon as wanted did not differ significantly among patients from small metropolitan (13.2%) or micropolitan (13.0%) areas compared with patients from large metropolitan (15.4%) areas.
- Across the total U.S. population, poor, near poor, and middle income persons significantly more often than high income persons reported that they sometimes or never got care for illness or injury as soon as they wanted; and persons with less than a high school education more often than persons with at least some college reported that they sometimes or never got care for illness or injury as soon as they wanted (Figure 4.52).
- Within each geographic area, disparities persisted for poor and near poor persons and persons with less than a high school education from every urban and rural area.
- Middle income persons from large metropolitan areas also reported that they sometimes or never got care as soon as they wanted significantly more often than high income persons.
- Persons with a high school education from micropolitan areas similarly reported that they sometimes or never got care as soon as they wanted significantly more often than respective persons with some college.

Access to Health Care

Health Insurance

Access to health care is a prerequisite to receipt of care, yet many Americans still face barriers to care. Data for prolonged periods of uninsurance are presented.

Figure 4.53. Adults under age 65 uninsured all year by race (top left), ethnicity (top right), income (bottom left), and education (bottom right), stratified by geographic location, 2003



Source: Medical Expenditure Panel Survey, 2003.

Reference population: Civilian noninstitutionalized population age 18 and over.

Note: Large metropolitan = metropolitan area ≥1 million inhabitants; small metropolitan = metropolitan area <1 million inhabitants; micropolitan = urban area >10,000 and <50,000 inhabitants.

- Across all geographic areas, the proportion of adults under age 65 uninsured all year did not differ significantly among patients from small metropolitan (13.2%) and micropolitan (15.0%) areas compared with patients from large metropolitan (13.7%) areas (Figure 4.53).
- Across the total U.S. population, the percentage of uninsured was significantly higher among Hispanics compared with non-Hispanic Whites.
- Within each geographic area, Hispanics were significantly more likely than non-Hispanic Whites to be uninsured.
- Blacks from micropolitan areas were also significantly more likely than Whites to be uninsured, although this disparity was not observed for Blacks from small or large metropolitan areas.
- Across the total U.S. population, the percentage of uninsured was significantly higher among poor, near poor, and middle income adults compared with high income adults and among adults with a high school education or less compared with adults with at least some college.
- Within each geographic area, poor, near poor, and middle income adults were significantly more likely than high income adults to be uninsured, and adults with a high school education or less were significantly more likely to be uninsured than adults with some college.

Individuals With Special Health Care Needs

Individuals with special health care needs include individuals with disabilities, individuals who utilize nursing home and home health care or end-of-life health care, and children with special heath care needs (CSHCN).

Many measures of relevance to individuals with special health care needs are tracked in the NHDR. As in the 2005 report, data on quality and access are presented for younger and elderly Medicare beneficiaries with disabilities and for CSHCN, as follows:

Elderly Medicare Beneficiaries With Disabilities

Component of health care need:	**Measure:**
Prevention	Mammography
Access to care	Delayed care due to cost

Younger Medicare Beneficiaries With Disabilities

Component of health care need:	**Measure:**
Prevention	Dental care

Children With Special Health Care Needs

Component of health care need:	**Measure:**
Timeliness	Care for illness or injury as soon as wanted
Patient centeredness	Patient experience of care

Additionally, findings for persons who utilize nursing home care are presented in the section on nursing home, home health, and hospice care in Chapter 2, Quality of Health Care.

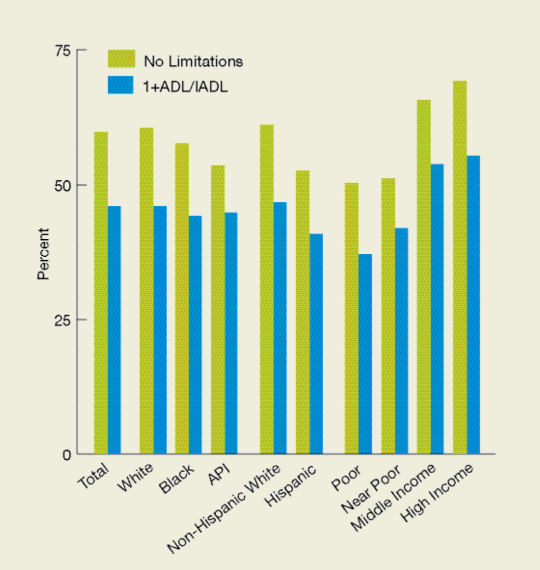
Elderly Medicare Beneficiaries With Disabilities

Several ways of defining and measuring disability exist. Two of the more common approaches are to identify functional activity limitations or to identify those meeting the eligibility criteria for a program that addresses disability, such as Social Security Disability Insurance (SSDI). A particular challenge in reporting on racial, ethnic, and socioeconomic differences related to disability is that many data collections do not capture disability and, when collected, do not have adequate sample sizes to examine racial, ethnic, and socioeconomic differences. This section uses data from the Medicare Current Beneficiary Survey to examine disparities in quality and access faced by Medicare beneficiaries age 65 and over who report problems with activities of daily living (ADLs) or instrumental activities of daily living (IADLs). About 42% of elderly Medicare beneficiaries, or 14 million people, have one or more ADLs or IADLs. Analyses of trends in disability and functioning among older adults indicate improvements in the last decade, with the prevalence of disability declining during the 1990s.[61]

Prevention: Mammography

Screening mammography is an effective way to discover breast cancer before a patient has symptoms and to reduce late stage cancer and mortality caused by this disease. It is recommended by the U.S. Preventive Services Task Force for all women age 40 and over.

Figure 4.54. Elderly Medicare beneficiaries with mammogram in the last year by race, ethnicity, income, and functional status, 2002



Key: API=Asian or Pacific Islander; ADL=activity of daily living; IADL= instrumental activity of daily living.

Source: Medicare Current Beneficiary Survey, 2002.

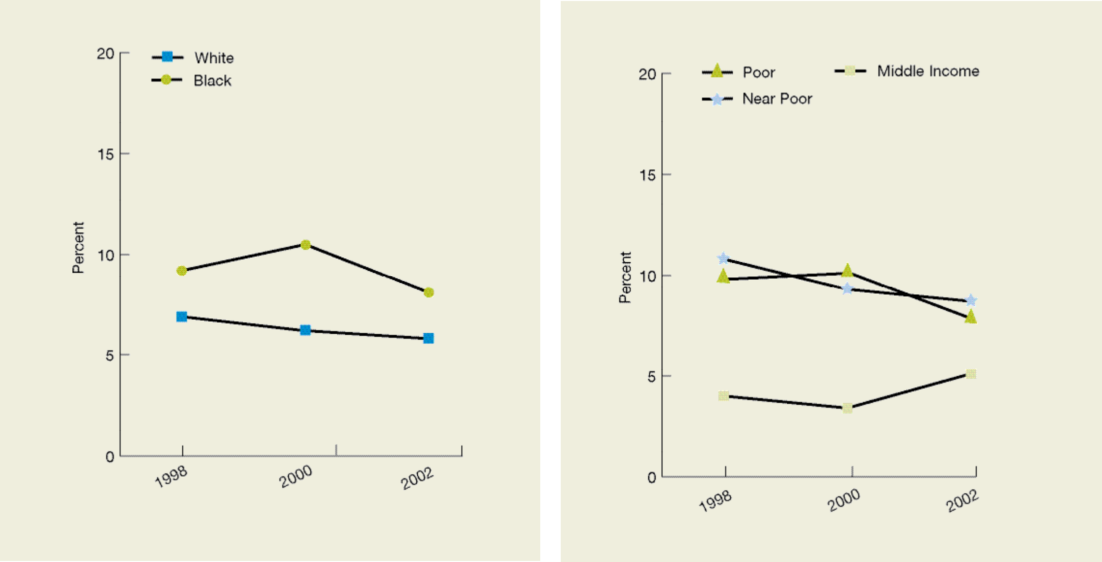
Reference population: Medicare beneficiaries age 65 or over living in the community.

- The percentage of elderly Medicare beneficiaries with a mammogram in the last year was significantly lower among individuals with functional limitations compared with those without limitations overall and for all population groups except APIs (Figure 4.54).
- Among beneficiaries with functional limitations, the percentage with a mammogram was significantly lower among poor and near poor beneficiaries compared with high income beneficiaries.
- Among beneficiaries without limitations, the percentage with a mammogram was significantly lower among Hispanics compared with non-Hispanic Whites and among poor and near poor beneficiaries compared with high income beneficiaries.
- In 2002, the Healthy People 2010 target of 70% of elderly women with a mammogram in the last year was not achieved by any population.

Access to Health Care: Delayed Care Due to Cost

Timely delivery of appropriate care has been shown to improve health care outcomes and reduce health care costs. Timely receipt of care is especially important for the elderly with disabilities due to the often increased medical needs of this population. Delayed health care can lead to diagnosis at a more advanced disease stage and reduce opportunities for optimal treatment.

Figure 4.55. Elderly Medicare beneficiaries with functional limitations who delayed health care due to cost by race (left) and income (right), 1998, 2000, and 2002



Source: Medicare Current Beneficiary Survey, 1998, 2000, and 2002.

Reference population: Medicare beneficiaries age 65 or over with one or more ADL or IADL limitations living in the community.

Note: Sample sizes are too small to provide data for high income persons. Therefore, these analyses by income compare poor and near poor persons with middle income persons.

- Overall, the percentage of elderly Medicare beneficiaries who delayed care due to cost was significantly higher among beneficiaries with functional limitations compared with those without functional limitations in all 3 years.
- In all 3 years, the percentage of elderly Medicare beneficiaries with functional limitations who delayed care due to cost was significantly higher among near poor beneficiaries compared with middle income beneficiaries (Figure 4.55). In 1998 and 2000, the percentage was also significantly higher among poor beneficiaries compared with middle income beneficiaries.
- From 1998 to 2002, the percentage of elderly Medicare beneficiaries with functional limitations who delayed care due to cost did not change significantly for any population.

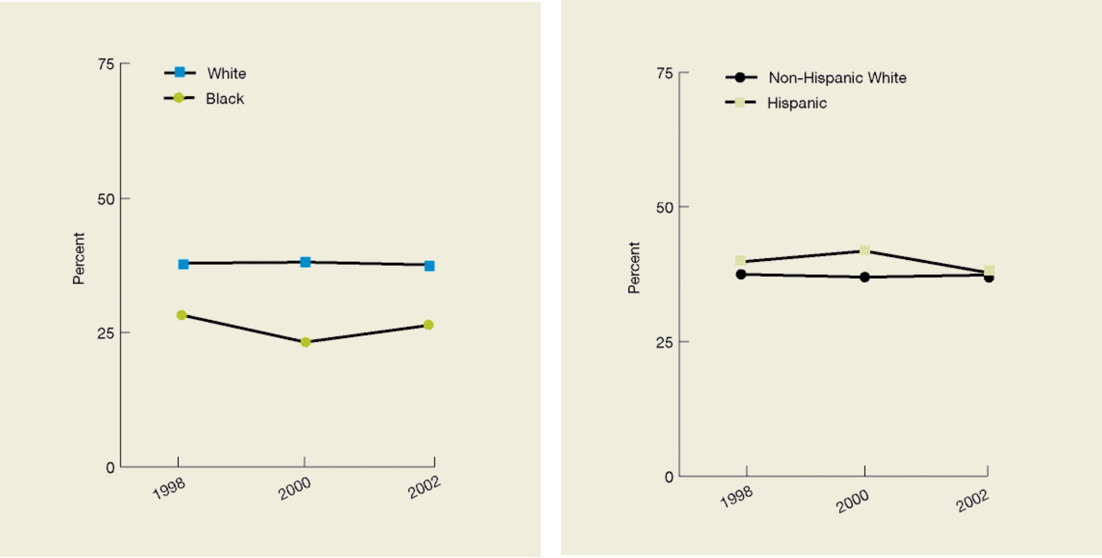
Younger Medicare Beneficiaries With Disabilities

About 5.6 million beneficiaries under age 65 qualified for Medicare in 2001, and that number is expected to grow to more than 9 million by 2020.[62] This section uses data from the Medicare Current Beneficiary Survey to examine disparities faced by Medicare beneficiaries under age 65, most of whom qualify for Medicare on the basis of SSDI disability.

Prevention: Dental Care

Regular dental visits promote prevention, early diagnosis, and optimal treatment of oral diseases. Failure to visit a dentist can result in delayed diagnosis and overall compromised health.

4.56. Medicare beneficiaries under age 65 with dental care in the past year by race (top left), ethnicity (top right), and income (bottom left), 1998, 2000, and 2002



Source: Medicare Current Beneficiary Survey, 1998, 2000, and 2002.

Reference population: Medicare beneficiaries ages 0-64 living in the community.

- In all 3 years, the percentage Medicare beneficiaries under age 65 who reported receiving dental care in the past year was significantly lower among Blacks compared with Whites and among poor and near poor beneficiaries compared with high income beneficiaries (Figure 4.56).
- In 2000 and 2002, the percentage with dental care was also significantly lower among middle income beneficiaries compared with high income beneficiaries.
- From 1998 to 2002, the percentage of Medicare beneficiaries under age 65 who reported receiving dental care in the past year did not change significantly for any population.
- Among Medicare beneficiaries under age 65, only high income individuals reached the Healthy People 2010 target of 56% of persons with a dental visit.

Children With Special Health Care Needs

Studying access to and quality of care for children with chronic conditions is difficult due to the low prevalence of most conditions in children.[63] From 12% to 23% of children have been identified as having a special health care need[64, 65]—i.e., a chronic condition with a functional limitation or other consequence.[63] Among the most highly prevalent chronic conditions of childhood in 2002 were asthma (12% of children ages 0-17), respiratory allergies (12%), learning disabilities (8% of children ages 3-17), and attention-deficit hyperactivity disorder (7% of children ages 3-17).[66]

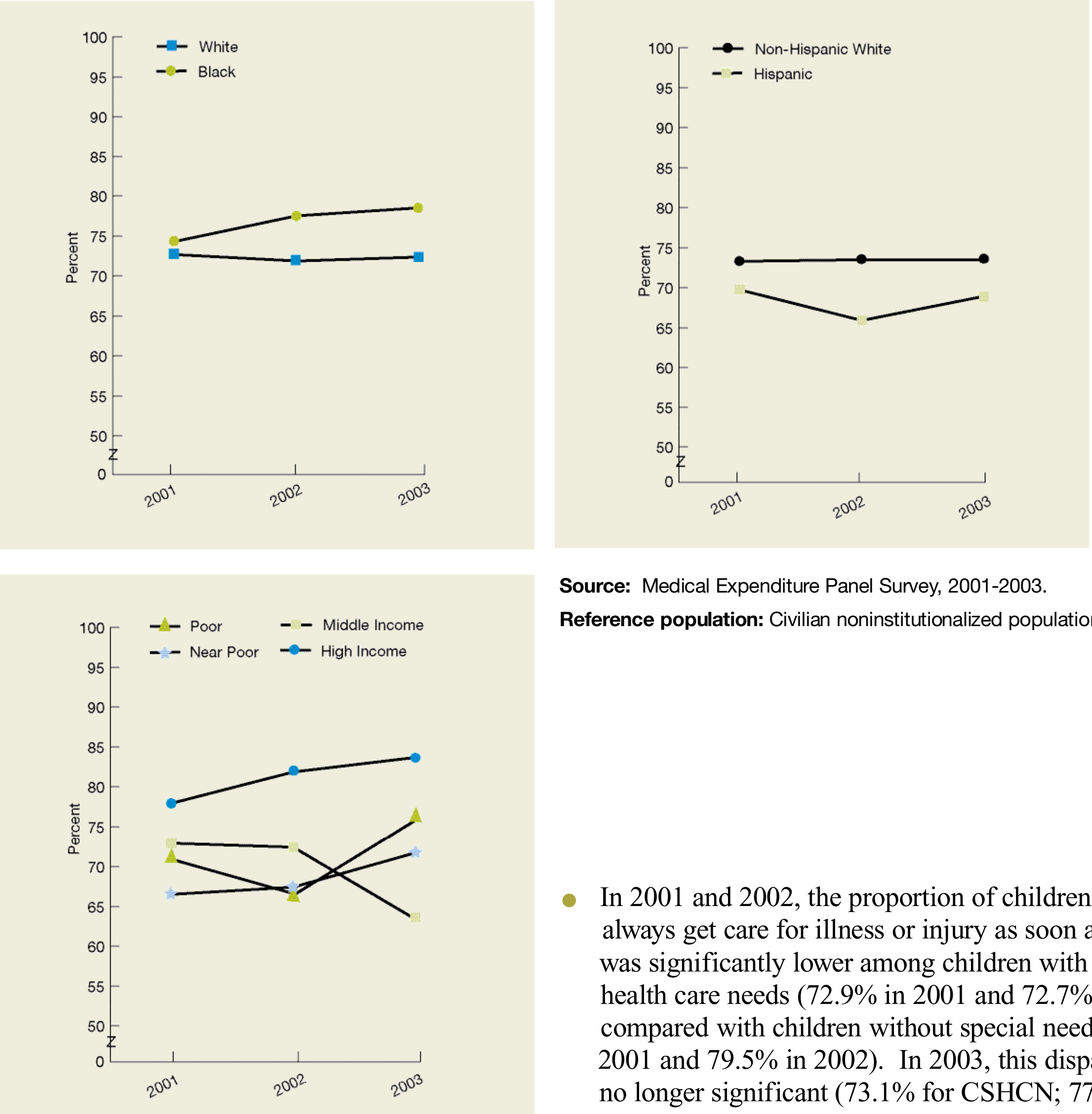
By definition, children with special health care needs are children who require more medical care because they are less healthy. As a result of requiring more medical care, CSHCN have higher medical expenses, on average, than other children.[63, 67] For more than 1 in 5 CSHCN, costs of care caused financial problems for their families.[65] In addition to financial burdens, families of CSHCN spend considerable time caring for them. An estimated 13.5% of CSHCN had families who spent 11 or more hours per week providing or coordinating care in 2001.[65]

Having higher health care needs makes CSHCN susceptible to access, cost, quality, and coverage weaknesses in the health care system. Children with chronic conditions are reported by their parents to be less likely than other children to receive the full range of needed health services.[68]

Timeliness: Care for Illness or Injury As Soon As Wanted

Timely delivery of appropriate care has been shown to improve health care outcomes and reduce health care costs, which may be particularly important for CSHCN.

Figure 4.57. Among children with special health care needs who need care right away, those who can always get care for illness or injury as soon as wanted, by race (top left), ethnicity (top right), and family income (bottom left), 2001-2003



Source: Medical Expenditure Panel Survey, 2001-2003.

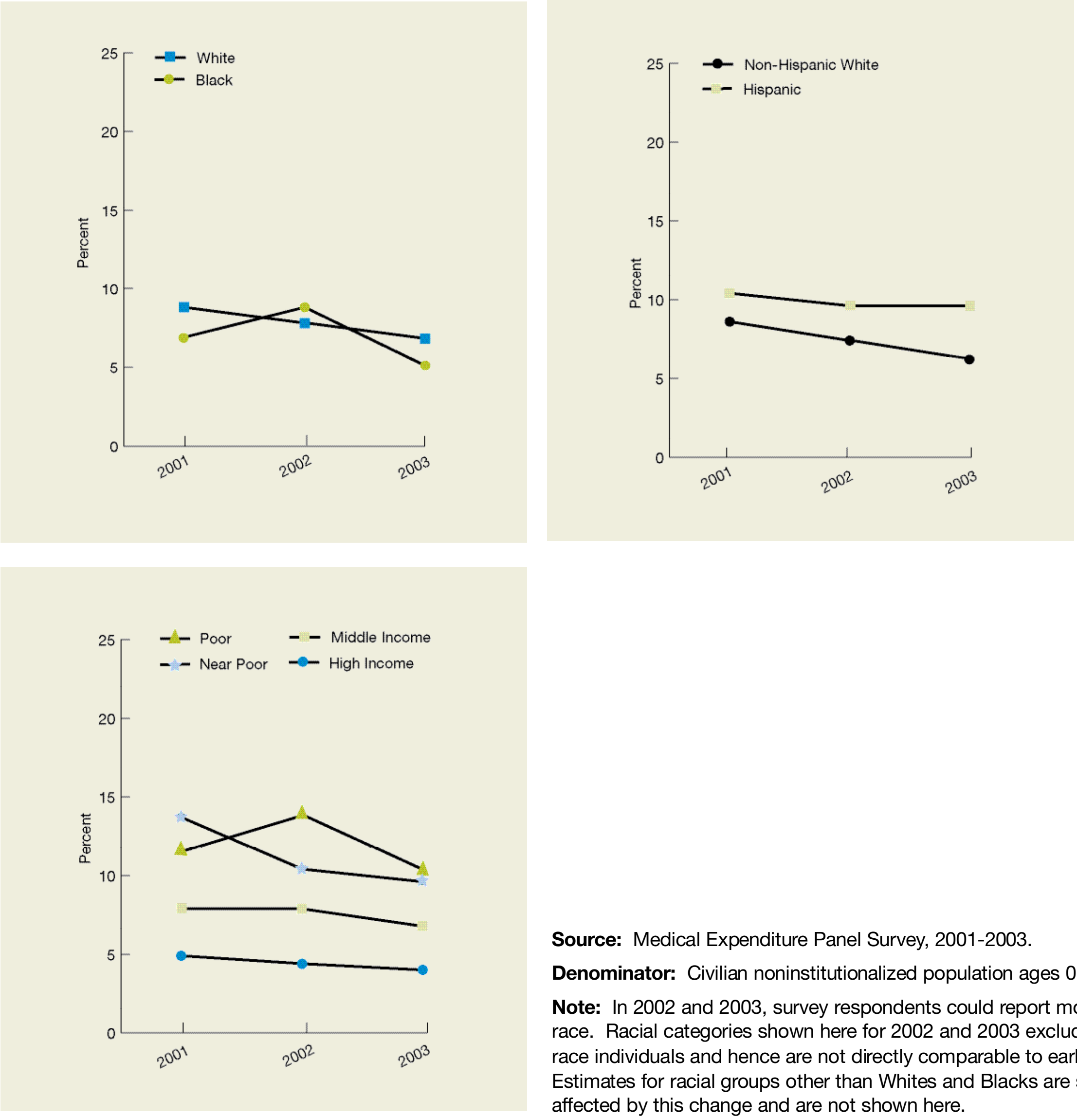
Reference population: Civilian noninstitutionalized population.

- In 2001 and 2002, the proportion of children who could always get care for illness or injury as soon as wanted was significantly lower among children with special health care needs (72.9% in 2001 and 72.7% in 2002) compared with children without special needs (78.7% in 2001 and 79.5% in 2002). In 2003, this disparity was no longer significant (73.1% for CSHCN; 77.9% for children without special needs).
- In 2003, the proportion of children with special health care needs who could always get care for illness or injury as soon as wanted was significantly lower among children from near poor and middle income families compared with children from high income families (Figure 4.57). Racial and ethnic differences were not significant.
- From 2001 to 2003, the proportion of children with special health care needs who could always get care for illness or injury as soon as wanted did not change significantly for any racial, ethnic, or income group.

Patient Centeredness: Patient Experience of Care

Patient centered health care requires good communication to ensure that a patient's needs and preferences are best met. For CSHCN, good communication with the child's parent/guardian is especially important to ensure their more complex and greater health care needs are optimally addressed.

Figure 4.58. Children with special health care needs whose parents/guardians reported that their child's health providers sometimes or never listened carefully, explained things clearly, respected what they had to say, and spent enough time with them, by race (top left), ethnicity (top right), and family income (bottom left), 2001-2003



Source: Medical Expenditure Panel Survey, 2001-2003.

Denominator: Civilian noninstitutionalized population ages 0-17.

Note: In 2002 and 2003, survey respondents could report more than one race. Racial categories shown here for 2002 and 2003 exclude multiple race individuals and hence are not directly comparable to earlier years. Estimates for racial groups other than Whites and Blacks are significantly affected by this change and are not shown here.

- In 2001 and 2002, parents/guardians of children with special health care needs were significantly more likely to report that their child's health providers sometimes or never listened carefully, explained things clearly, respected what they had to say, or spent enough time with them (8.5% in 2001 and 8.2% in 2002) compared with parents of children without special health care needs (6.4% in 2001 and 6.3% in 2002).

- In 2003 this disparity was eliminated (7.1% for children with special health care needs; 5.8% for children without special health care needs).
- In all 3 years, children with special health care needs in poor and near poor families were significantly more likely to report communication problems compared with those in high income families (Figure 4.58).
- In 2003, Hispanic and middle income children with special health care needs were significantly more likely than non-Hispanic White and high income children with special health care needs, respectively, to report communication problems.
- From 2001 to 2003, the proportion of children with special health care needs whose parents/guardians reported that their child's health providers sometimes or never listened carefully, explained things clearly, respected what they had to say, or spent enough time with them did not change significantly or for any racial, ethnic, or income group.

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List of Core Measures

Core Measures, Data Sources, and Availability for Select Groups

Measure	Data source	Black	Hispanic	Asian or API	AI/AN	Poor
Quality						
Colorectal cancer incidence per 100,000 men and women age 50 and over diagnosed at advanced stage	SEER	✔	✔	✔	✔	
Deaths per 100,000 persons due to colorectal cancer	NVSS-M	✔	✔	✔	✔	
Adults age 40 and over with diabetes who had all three exams in last year: hemoglobin A1c test, retinal eye examination, and foot examination	MEPS	✔	✔			✔
Hospital admissions for lower extremity amputations in patients with diabetes	NHDS	✔				
Dialysis patients registered on the waiting list for transplantation	USRDS	✔	✔	✔	✔	
Hemodialysis patients with adequate dialysis	ESRD CPMP	✔	✔	✔	✔	
Smokers receiving advice to quit smoking	MEPS	✔	✔			✔
Obese adults who were given advice about exercise	MEPS	✔	✔			✔
Hospital care for heart attack patients	QIO	✔	✔	✔	✔	
Hospital care for acute heart failure patients	QIO	✔	✔	✔	✔	
Deaths per 1,000 adult admissions with acute myocardial infarction	HCUP	✔	✔	✔		✔
New AIDS cases among persons ages 13 and over	CDC AIDS Surveillance	✔	✔	✔	✔	
Pregnant women receiving prenatal care in first trimester	NVSS-N	✔	✔	✔	✔	
Infant mortality per 1,000 live births, birthweight <1,500 grams	NVSS-N	✔	✔	✔	✔	
Children 19-35 months who received all recommended vaccinations	NIS	✔	✔	✔	✔	✔
Adolescents (13-15) who received 3 or more doses of hepatitis B vaccine	NHIS	✔	✔			✔
Admissions for pediatric gastroenteritis per 100,000 population age less than 18 years	HCUP	✔	✔	✔		✔

✔ Indicates that reliable data on measure are available for this group and included in summary across measures of quality and access for this group.

Key: API=Asian or Pacific Islander; AI/AN=American Indian or Alaska Native; Poor=individuals with household incomes <100% of Federal poverty thresholds.

Core Measures, Data Sources, and Availability for Select Groups (continued)

Measure	Data source	Black	Hispanic	Asian or API	AI/AN	Poor
Children age 2-17 who received advice about healthy eating from a doctor or other health provider	MEPS	✔	✔	✔		✔
Children age 3-6 whose vision was checked by a doctor or other health provider	MEPS	✔	✔			✔
Deaths due to suicide per 100,000 persons	NVSS-N	✔	✔	✔	✔	
Adults with past year major depressive episode who received treatment for depression	NSDUH	✔	✔			✔
Persons age 12 and over who needed treatment for any illicit drug use and who received such treatment at a specialty facility	NSDUH	✔	✔		✔	✔
Persons receiving substance abuse treatment who completed the treatment course	TEDS	✔	✔			
People 65 and over who ever received pneumococcal vaccination	NHIS	✔	✔	✔	✔	✔
Hospital care for pneumonia patients	QIO	✔	✔	✔	✔	
Antibiotics prescribed at visits with a diagnosis of common cold per 10,000 population	NAMCS-NHAMCS	✔				
Admissions for pediatric asthma per 100,000 population age less than 18 years	HCUP	✔	✔	✔		✔
Tuberculosis (TB) patients who complete a curative course of treatment within 12 months of initiation of treatment	CDC TB Surveillance	✔	✔	✔	✔	
Long-stay nursing home residents who were physically restrained	MDS	✔	✔	✔	✔	
High-risk long-stay nursing home residents who have pressure sores	MDS	✔	✔	✔	✔	
Short-stay nursing home residents who have pressure sores	MDS	✔	✔	✔	✔	
Home health care patients who get better at walking or moving around	OASIS	✔	✔	✔	✔	
Home health care patients who had to be admitted to the hospital	OASIS	✔	✔	✔	✔	

✔ Indicates that reliable data on measure are available for this group and included in summary across measures of quality and access for this group.

Key: API=Asian or Pacific Islander; AI/AN=American Indian or Alaska Native; Poor=individuals with household incomes <100% of Federal poverty thresholds.

Core Measures, Data Sources, and Availability for Select Groups (continued)

Measure	Data source	Black	Hispanic	Asian or API	AI/AN	Poor
Surgical patients with postoperative pneumonia, urinary tract infection, and/or venous thromboembolic event	MPSMS	✔				
Surgical patients with appropriate timing of prophylactic antibiotics	QIO	✔	✔	✔	✔	
Patients receiving central venous catheters with bloodstream infection and/or mechanical adverse event	MPSMS	✔				
Deaths per 1,000 discharges among patients with select complications of care	HCUP	✔	✔	✔		
Elderly with at least one prescription for a potentially inappropriate medication	MEPS	✔	✔			✔
Adults who can sometimes or never get care for illness or injury as soon as wanted	MEPS	✔	✔	✔		✔
Emergency department visits in which patient left before being seen	NHAMCS	✔				
Adults whose health providers sometimes or never listen carefully, explain things, show respect, and spend enough time with them	MEPS	✔	✔	✔	✔	✔
Children whose health providers sometimes or never listen carefully, explain things, show respect, and spend enough time with them	MEPS	✔	✔	✔		✔
Access						
People under 65 with health insurance	NHIS	✔	✔	✔	✔	✔
People uninsured all year	MEPS	✔	✔	✔	✔	✔
People who have a specific source of ongoing care	NHIS	✔	✔	✔	✔	✔
People who have a usual primary care provider	MEPS	✔	✔	✔	✔	✔
Families that experience difficulties or delays in obtaining health care or do not receive needed care	MEPS	✔	✔	✔	✔	✔
Families that experience difficulties or delays in obtaining health care due to financial or insurance reasons	MEPS	✔	✔			✔

✔ Indicates that reliable data on measure are available for this group and included in summary across measures of quality and access for this group.

Key: API=Asian or Pacific Islander; AI/AN=American Indian or Alaska Native; Poor=individuals with household incomes <100% of Federal poverty thresholds.

List of Core Measures

Key to Data Sources:

ESRD CPMP = End Stage Renal Disease Clinical Performance Measures Project
HCUP = Healthcare Cost and Utilization Project
MDS = Minimum Data Set
MEPS = Medical Expenditure Panel Survey
MPSMS = Medicare Patient Safety Monitoring System
NAMCS = National Ambulatory Medical Care Survey
NHAMCS = National Hospital Ambulatory Medical Care Survey
NHDS = National Hospital Discharge Survey
NHIS = National Health Interview Survey
NIS = National Immunization Survey
NSDUH = National Survey on Drug Use and Health
NVSS-M = National Vital Statistics System, Mortality
NVSS-N = National Vital Statistics System, Natality
OASIS = Outcome and Assessment Information Set
QIO = Quality Improvement Organization Program
SEER = Surveillance, Epidemiology, and End Results Program
TEDS = Treatment Episode Data Set
USRDS = United States Renal Data System

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