

2005 Survey of Public Knowledge, Attitudes, and Practices Related to Eye Health and Disease



March 2008

TABLE OF CONTENTS

	<u>Page</u>
ACKNOWLEDGEMENTS	I
EXECUTIVE SUMMARY	III
Methodology	iii
Key Findings	iv
Summary of 1991 and 2005 KAP Comparisons	vii
Conclusions	viii
Recommendations	ix
CHAPTER 1: INTRODUCTION	1
Major Eye Diseases.....	1
Purpose of Survey.....	3
Methodology and Analysis.....	3
Reading and Understanding Results	4
Limitations	6
CHAPTER 2: GENERAL INFORMATION	10
Overview of Survey Respondents	10
CHAPTER 3: EYE HEALTH	19
CHAPTER 4: EYE EXAMINATIONS	30
CHAPTER 5: KNOWLEDGE ABOUT EYE DISEASE	40
Glaucoma	40
Age-Related Macular Degeneration (AMD).....	42
Diabetic Eye Disease	45
Low Vision	48
CHAPTER 6: INFORMATION SOURCES	51
CHAPTER 7: SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS	59
Summary of Report Highlights	59
Summary of 1991 and 2005 KAP Comparisons	61
Conclusions.....	62
Recommendations	63

APPENDICES

- Appendix A: Final 2005 KAP Survey
- Appendix B: Survey Methodology
- Appendix C: Survey Items Responses by Race/Ethnicity
- Appendix D: Qualifications of Interviewers
- Appendix E: Confidentiality Agreement
- Appendix F: KAP Survey—Interviewer Training Manual
- Appendix G: Summary of Non-Response Error Analysis
- Appendix H: Error Margins for Selected Variables and Item Response Scenarios
- Appendix I: Frequency Distributions of 2005 KAP Variables for Adults Aged 18 and Older (weighted)
- Appendix J: Issues for Consideration for Future Research
- Appendix K: Knowledge, Attitudes, and Practices Subanalyses

ACKNOWLEDGEMENTS

The 2005 Survey of Public Knowledge, Attitudes, and Practices (KAP) Related to Eye Health and Disease report was prepared by Macro International Inc. (Macro) for the National Eye Institute (NEI), National Institutes of Health, and Lions Clubs International Foundation (LCIF) through its SightFirst program. Funding to support this effort was provided to Macro under NEI Contract No. 263-01-D-017439 and LCIF grant numbers SF 1150/UND and SF 1197. The Project Officer for this effort was Rosemary Janiszewski, Acting Associate Director for the Office of Communication, Health Education, and Public Liaison, NEI, and Gina Prendki, Sight Program Coordinator, LCIF. Adrienne Semidey and Arlen Rosenthal of Macro served as grant administrator and project director, respectively.

The following work group of nationally recognized eye health professionals, survey methodologists, and statisticians was formed by NEI and LCIF to guide the development, implementation, and analysis of the survey used to collect the data used in developing the 2005 KAP Study:

Anne Coleman, M.D., Ph.D.
Jules Stein Eye Institute
University of California, Los Angeles
Los Angeles, CA

Eve Higginbotham, M.D.
Morehouse School of Medicine
Atlanta, GA

Mary Frances Cotch, Ph.D.
Division of Epidemiology and Clinical
Research
National Eye Institute
Bethesda, MD

Amy Horowitz, D.S.W.
Jewish Home & Hospital Lifecare
System
New York, NY

Claude Cowan, M.D., M.P.H.
VA Medical Center
Washington, DC

Ronald Klein, M.D., M.P.H.
Department of Ophthalmology and
Visual Sciences
University of Wisconsin
Madison, WI

Rebecca Teel Daou
Lions Clubs International Foundation
Oak Brook, IL

Ramachandra Pararajasegaram, M.D.,
D.Sc.
World Health Organization
Geneva, Switzerland

Mark Eberhardt, Ph.D.
National Center for Health Statistics
Centers for Disease Control and
Prevention
Hyattsville, MD

Rohit Varma, M.D., M.P.H.
Doheny Eye Institute
University of Southern California

Richard Edlow, O.D.
Chair, Information & Data Committee
American Optometric Association
Baltimore, MD

This research effort was supported by Robert Alexander, Jr., Ph.D., and William Scarbrough, Ph.D., of Macro.

Public Domain Notice

All material appearing in this report is in the public domain and may be reproduced or copied without permission from NEI. Citation of the source is appreciated.

Recommended Citation

National Eye Institute & Lions Clubs International Foundation. (2007). *2005 survey of public knowledge, attitudes, and practices related to eye health and disease*. Bethesda, MD: National Eye Institute. Available at: <http://www.nei.nih.gov/nehep/kap/>.

EXECUTIVE SUMMARY

Eye diseases, which include diabetic retinopathy, glaucoma, cataract, and age-related macular degeneration, cause blindness and impaired vision in millions of Americans (Congdon et al., 2004). The growing prevalence of many eye diseases is a major public health problem that can lead to loss of productivity and reduced quality of life. Additional research indicates that disparities exist in the prevalence of certain eye diseases and in the use of vision care services among minorities, particularly among Hispanics (Higginbotham et al., 2004; Kempen et al., 2004; Varma, Ying-Lai, Klein, & Azen, 2004). Notwithstanding, the aging of the Nation, the increasing prevalence of eye diseases, and the disparities in use of vision care services bring into question the public's overall knowledge about eye health and disease, as well as their attitudes and practices regarding eye health.

To better ascertain the public's knowledge, attitudes, and practices (KAP) regarding eye health and disease, the National Eye Institute (NEI) and the Lions Clubs International Foundation (LCIF) cosponsored a national telephone survey titled 2005 Survey of Public Knowledge, Attitudes, and Practices Related to Eye Health and Disease. NEI and LCIF cosponsored the first KAP Study in 1991. In addition to providing a current assessment of the public's KAP regarding eye health and disease, the 2005 KAP Study offers second point-in-time estimates for selected eye health and disease issues, and provides direction for messages and programs.

Methodology

NEI and LCIF formed a work group composed of nationally recognized eye health professionals, survey methodologists, and statisticians to review the 1991 survey, consider the overall purpose of the 2005 survey, and recommend modifications to the 1991 survey instrument. The work group decided that the 2005 KAP survey would include the following seven sections:

1. General Health
2. Eye Health
3. Eye Examinations: Experiences and Attitudes
4. Knowledge About Eye Disease

5. Information Sources
6. Insurance
7. Demographic Information

The 2005 KAP Study was conducted in compliance with the U.S. Department of Health and Human Services' regulations for the protection of human research subjects (45 CFR 46), including review of the survey instrument and data collection protocol by the Institutional Review Board at Macro International Inc., a contractor of NEI and LCIF.

Between October 2005 and January 2006, telephone interviews were conducted with randomly selected non-institutionalized adults, aged 18 and older, living in land-line telephone-equipped housing units in the United States. Interviews were conducted in either English or Spanish. To support more precise estimates for the Asian population living in the United States, a supplemental sample of Asian adults aged 18 and older was obtained. A total of 3,180 interviews were completed.

Key Findings

All reported findings have been statistically weighted to the 2000 U.S. Population Census using geographic location, race/ethnicity, age, gender, and years of education. To appropriately compare percentages of persons from different races and ethnicities reporting certain KAP regarding eye health and disease, those percentages must be age-adjusted so that any differences between groups reflect real differences and not simply differences associated with age. Highlights of selected key findings are summarized below.

General Health

Most adults report being generally in good to excellent health and having seen a doctor in the past two years. Many adults report that loss of their eyesight would have the greatest impact on their daily life.

- Eighty-three percent (83%) of adults aged 18 and older describe their health as good, very good, or excellent.
- Ninety-three percent (93%) of adults aged 18 and older report visiting a health care provider (HCP) within the past two years. An HCP can be a doctor such as a primary care provider (PCP), nurse practitioner, or other

medical professional who has given a physical examination or written prescriptions.¹

- Forty-three percent (43%) of adults aged 18 and older report having been told by their HCP that they have a chronic health condition. Those chronic health conditions include high blood pressure (27%), arthritis (21%), diabetes (10%), heart disease (7%), and cancer (6%).
- When asked to think about certain conditions that would affect their day-to-day living, 71% of adults aged 18 and older report loss of eyesight as a 10 on a scale of 1 to 10, with 10 indicating greatest impact.

Eye Health

Two-thirds of all adults report wearing some type of eyewear, and nearly one-quarter of adults report that they have an eye condition or disease.

- Sixty-six percent (66%) of adults aged 18 and older report wearing some type of eyewear, including glasses, contact lenses, both glasses and contact lenses, or reading glasses only.
- Twenty-two percent (22%) of adults aged 18 and older report being told by an eye care provider (ECP) that they have an eye disease or condition. An ECP is an ophthalmologist or optometrist.
- Nineteen percent (19%) of adults aged 18 and older report ever having an eye injury or trauma requiring a doctor's care in the emergency room or at a doctor's office.

Eye Examinations: Experiences and Attitudes

Most adults report having their eyes examined, often by an ECP. Many adults also report having an eye examination within the past two years and having their pupils dilated during the eye examination.

- Ninety-one percent (91%) of adults aged 18 and older report having had their eyes examined by an HCP. Blacks (95%) and Caucasians (94%) more

¹ An HCP does not include eye care providers (ECPs). An ECP is an ophthalmologist or optometrist.

often report having had their eyes examined by an HCP than Asians (87%) and Hispanics (73%).^c

For the following series of items, adults were told that an HCP includes their PCP and ECP.

- Of the 91% of adults who report having had their eyes examined by an HCP, 76% report having had their pupils dilated by an HCP during an eye examination.
- Eighty-six percent (86%) of adults typically go to an ECP to have their eyes examined.
- Seventy-four percent (74%) report having had their eyes examined within the past two years by an ECP.

Virtually all adults are likely to seek eye care if encouraged by their PCP and/or family members.

- Almost all adults (96%) say they would be somewhat or very likely to have their eyes examined if their PCP suggested they do so. Seventy-nine percent (79%) of adults say they would do so if a member of their family suggested they do so.

Knowledge About Eye Disease

Most adults report having heard of glaucoma. Fewer adults report having heard of diabetic eye disease, age-related macular degeneration (AMD), and low vision, and knowing specific details about these eye diseases and conditions.

- Ninety percent (90%) of adults aged 18 and older report that they have heard of glaucoma. However, only 8% know that there are no early warning symptoms for glaucoma.
- Fifty-two percent (52%) of adults aged 18 and older report that they have heard of AMD.
- Fifty-one percent (51%) of adults aged 18 and older report that they have heard of diabetic eye disease, such as diabetic retinopathy. However, only

^c p<.001 (This represents the probability that the highest and lowest percentages compared are statistically different.)

a reported 11% know that eye diseases caused by diabetes usually have no early warning symptoms.

- Sixteen percent (16%) of adults aged 18 and older report that they have heard of the term “low vision.”

Information Sources

Most adults report seeing or hearing something about eye health or disease on television programs or commercials more than any other information source. Almost the same percentage of adults reports having never seen or heard anything about eye health or disease.

- Over the past 12 months, 24% of adults aged 18 and older report seeing or hearing something about eye health or disease on television programs or commercials.
- Twenty-one percent (21%) of adults aged 18 and older report that they have not seen or heard anything about eye health or disease.

Insurance

Many adults report having some form of health insurance in which all or part of the cost of a regular eye exam conducted by an ECP is covered.

- Eighty percent (80%) of adults aged 18 and older report having some form of health care coverage. Among these adults, 94% report having had their eyes examined by an HCP.
- Sixty-seven percent (67%) of adults aged 18 and older report that all or part of the cost of a regular eye exam provided by an ECP was covered by health insurance.

Summary of 1991 and 2005 KAP Comparisons

Although the 1991 data cannot be completely adjusted for statistical comparisons with the 2005 data, there are several noteworthy differences between the 1991 and 2005 KAP Studies (see the following table).

1991 & 2005 KAP Data Comparisons

Survey Item	1991	2005	Difference
Adults who report their general health as being good, very good, or excellent	85%	83%	-2%
Adults who report they have the following chronic diseases:			
• Diabetes	5%	10%	5%
• High blood pressure	19%	27%	8%
• Heart disease	7%	7%	0%
• Arthritis	22%	21%	-1%
• Cancer	7%	6%	-1%
Adults who wear some type of eyewear	66%	66%	0%
Adults who report their eyesight as good or excellent (1991) or good, very good, or excellent (2005)	87%	90%	3%
Adults who have had their eyes examined by an ECP in the past two years	65%	74%	9%
Adults who report being told by an ECP that they have an eye condition or disease	18%	22%	4%
• Cataract	35%	13%	-22%
• Glaucoma	11%	3%	-8%
• Nearsightedness	11%	38%	27%
Adults who report having heard of glaucoma	91%	90%	-1%
Adults who report having heard of diabetic eye disease	39%	51%	12%

Conclusions

The overall survey findings may not be surprising, yet patterns and trends in the data merit closer monitoring and a more detailed examination. The following results and conclusions are of particular note:

- Adults aged 18 and older are aware of eye disease and conditions, but few know certain important details about eye disease or conditions, such as that there are no early warning symptoms for glaucoma and diabetic eye disease.
- Asian, Black, and Caucasian adults are more knowledgeable about eye disease, have different attitudes about eyesight, and are more likely to have their eyes examined to prevent or detect eye disease or visual impairment than Hispanic adults.
- More in-depth studies may be important to support strategic intervention efforts to influence eye health knowledge, attitudes, and practices of Hispanics to reduce ethnic disparities in eye disease and visual impairment.

- Adults report getting their eye health or disease information most frequently from television programs and commercials. Adults also receive eye health and disease information in their doctor's office and from newspapers and magazines.
- PCPs should be encouraged to have basic eye health and disease information available in their offices.
- PCPs, family members, and coworkers have the most influence on the demand for and receipt of eye care services.

Recommendations

The 2005 KAP Study is an important source of information about what adults in the United States know, believe, and do about eye health and eye disease. As a result, we offer the following education and awareness recommendations to help ensure that the information gleaned from the 2005 KAP Study is used to its full advantage. These recommendations include ideas to improve the type of information adults have that can help them make informed decisions about their eye health needs.

Recommendation 1: Implement an educational effort to increase the general awareness of adults about the asymptomatic nature of eye disease and the importance of early detection and treatment.

Although most adults are familiar with common eye disease, they lack key information that can facilitate early detection and treatment. There is a critical need to educate the public about glaucoma, diabetic eye disease, AMD, refractive errors, low vision, and the asymptomatic nature of these conditions.

Improved targeting strategies are also needed to ensure that the general public is aware that many eye health educational materials already exist. Some audience segments that could be considered as a focus for educational efforts to increase awareness that there are no warning symptoms for eye disease include children, the workforce, middle-aged adults caring for their elderly parents, and older adults.

Recommendation 2: Implement a culturally appropriate educational effort for Hispanics to increase awareness about eye disease and conditions for which they are at higher risk for developing.

The U.S. population is becoming more ethnically diverse (Bernstein, 2006), and this diversity is evidenced by the differential knowledge of, attitudes toward, and practices regarding eye health and disease. Hispanics lack key information about protecting the health of their eyes and vision. The survey results indicate that Hispanic adults are less likely to have their eyes examined to prevent or detect eye disease or visual impairment than Asian, Black, and Caucasian adults. More Hispanics (41%) report that they have not seen or heard anything about eye health or disease in the past 12 months compared with Asians (28%), Blacks (26%), and Caucasians (16%).

The reported findings about Hispanics warrant the provision of health educational efforts for eye disease and conditions to make them more applicable and accessible to this population and to convey the importance of eye examinations to preserve healthy vision.

Recommendation 3: Provide information to primary care providers, as well as nurse practitioners, physician assistants, nurses, and other people who typically serve as gatekeepers for medical care, to increase their awareness of the need for regular comprehensive dilated eye examinations for all adults (especially people at higher risk for eye disease and conditions).

Ninety-three percent (93%) of adults have visited an HCP within the past two years. The 2005 KAP Study reveals that virtually all adults (96%) are likely to seek eye care if encouraged by their PCP. Based on the frequency of visits adults make to HCPs and the likelihood of adults to follow their PCP's suggestion to have their eyes examined, serious consideration should be given to having those providers who regularly see patients (e.g., PCPs, nurse practitioners, physician assistants) ask their patients about their eye health, assess whether their patients are at higher risk for eye disease, and refer them to an ECP for a comprehensive dilated eye exam, if appropriate.

References

- Bernstein, R. (2006). Nation's population one-third minority. Retrieved April 11, 2007, from <http://www.census.gov/Press-Release/www/releases/archives/population/006808.html>.
- Congdon, N., O'Colmain, B., Klaver, C. C. W., Klein, R., Munoz, B., Friedman, D., et al. (2004). Causes and prevalence of visual impairment among adults in the United States. *Archives of Ophthalmology*, 122, 477–485.
- Higginbotham, E. J., Gordon, M. O., Beiser, J. A., Drake, M. V., Bennett, G. R., Wilson, M. R., et al. (2004). The Ocular Hypertension Treatment Study: Topical medication delays or prevents primary open-angle glaucoma in African American individuals. *Archives of Ophthalmology*, 122, 813–820.
- Kempen, J. H., O'Colmain, B. J., Leske, M. C., Haffner, S. M., Klein, R., Moss, S. E., et al. (2004). The prevalence of diabetic retinopathy among adults in the United States. *Archives of Ophthalmology*, 122, 552–563.
- Varma, R., Ying-Lai, M., Klein, R., & Azen, S. (2004). Prevalence and risk indicators of visual impairment and blindness in Latinos. The Los Angeles Latino Eye Study. *Ophthalmology*, 111, 1132–1140.

CHAPTER 1: INTRODUCTION

This chapter presents information to give context to the report. The first section provides an overview of major eye disease and its effects on public health. This is followed by a section that addresses the purpose of the 2005 Survey of Public Knowledge, Attitudes, and Practices (KAP) Related to Eye Health and Disease. A brief overview of the methodology and analysis used in conducting the survey and an explanation to assist in reading and understanding the results are also provided.

Major Eye Diseases

Eye disease, a major public health issue, can lead to diminished quality of life and daily functioning for millions of people in the United States. The leading causes of visual impairment and blindness in the United States include diabetic retinopathy, glaucoma, age-related macular degeneration (AMD), and cataract.

Diabetic retinopathy, the most common ocular complication of diabetes mellitus, is a leading cause of new cases of blindness in the U.S. population aged 20 to 74. It is estimated that 40.8% of adults aged 40 and older with diabetes have diabetic retinopathy and 8.2% have advanced, vision-threatening retinopathy (Kempen et al., 2004). Data from the Los Angeles Latino Eye Study (LALES) suggest that the prevalence of diabetic retinopathy is high among Latinos, primarily of Mexican ancestry. Researchers found that Latinos appear to have a higher rate of more severe vision-threatening diabetic retinopathy than non-Hispanic Whites (Varma et al., 2004a).

Glaucoma, a leading cause of blindness worldwide, is a group of eye diseases that can damage the optic nerve and result in vision loss and blindness. Glaucoma may be caused by an increase in eye pressure, though in some forms, eye pressure is normal. It is estimated that primary open-angle glaucoma (POAG), the most common type of glaucoma, affects 2.22 million U.S. citizens (Friedman et al., 2004b). African Americans have almost three times the prevalence of POAG than Whites (Friedman et al., 2004a). The prevalence of POAG is also high among Latinos of Mexican ancestry (Varma et al., 2004b).

AMD is a disease that gradually destroys sharp, central vision. It is a leading cause of blindness among European-descended adults aged 64 and older (Friedman et al., 2004a). The overall prevalence of AMD in the U.S. population aged 40 and older is estimated at 1.5%, with 1.8 million individuals affected.

Owing to the increased aging of the U.S. population, this number is projected to increase to almost 3 million by 2020. The disease is more common in Whites than in African Americans. The incidence of AMD increases dramatically with age among both men and women; 16% of White women aged 80 or older are affected by advanced AMD, while 12% of White men aged 80 or older are affected by advanced AMD (Friedman et al., 2004a). There is currently no proven treatment that slows or prevents the development of advanced AMD.

Cataract, a clouding of the lens in the eye, is a leading cause of treatable blindness in the world. An estimated 20.5 million Americans aged 40 or older have cataract in either eye (Congdon et al., 2004b). Cataract is more prevalent among women than men, and increases with age among both Blacks and Whites. The total number of persons with cataract is estimated to increase by 50% to 30.1 million by the year 2020 (Congdon et al., 2004b). In the United States, cataract causes about 50% of the cases of vision loss among Whites, African Americans, and Hispanics/Latinos. African American men are more likely to be blind from cataract than White men (Congdon et al., 2004a). Cataract occurs in 20 percent of the Hispanic/Latino population (Varma et al., 2004c).

Because age is a risk factor for all of these eye disorders, the prevalence of them is projected to increase rapidly as the population ages (Friedman et al., 2004a; Friedman et al., 2004b; Kempen et al., 2004; Congdon et al., 2004a).

In addition to these eye diseases, uncorrected refractive error is a leading cause of visual impairment. A recent study found that even though 94% of the U.S. population aged 12 and older have good distance vision, the remaining 6%, or an estimated 14 million people, are visually impaired. Of those who are visually impaired, more than 11 million have uncorrected refractive error such as near-sightedness, or myopia, and need eyeglasses or contact lenses to improve their vision. Among people aged 12 and older, people with diabetes, Hispanics, and people who are economically disadvantaged have higher rates of visual impairment and can most benefit from corrective lenses (Vitale, Cotch, and Sperduto, 2006).

It is estimated that 2.4 million Americans have low vision (Congdon et al., 2004a). Low vision is defined as a visual impairment not correctable by standard eyeglasses, contact lenses, medication, or refractive surgery that interferes with the ability to perform everyday activities. Cataract is the most frequently reported condition in persons with low vision, associated with 59% of low vision cases among Whites, 51% among Blacks, and 47% among Hispanics (Congdon et al., 2004a).

Purpose of Survey

Information about the prevalence of eye disease and disorders, as well as information about adults' knowledge, attitudes, and practices (KAP) regarding eye health and disease, is crucial to the design of effective vision programs and the legislation of important vision-related policy. Unfortunately, information about perceptions regarding eye health and disease has not been readily available. To fill this information gap, in 1991 the National Eye Institute (NEI) and Lions Clubs International Foundation (LCIF), through its SightFirst program, cosponsored a random-digit-dial telephone survey to examine KAP related to eye health and eye disease among adults. This national probability sample included 1,000 adults aged 18 and older and two subsamples. One subsample included approximately 200 adults aged 55 and older, and the other included Blacks aged 40 and older. Results from the 1991 KAP Study revealed that the public was largely unaware of the benefits of early detection and timely treatment of eye disease and, furthermore, was unaware of simple, low-cost ways to safeguard their eyes and maintain or improve eye health (National Eye Institute, 1992).

In 2005, nearly 15 years after the first KAP Study, NEI and LCIF again collaborated and cosponsored the 2005 Survey of Public Knowledge, Attitudes, and Practices Related to Eye Health and Disease. The purposes of this survey are the following:

- Measure the public's KAP regarding eye health and disease.
- Establish second point-in-time estimates for selected eye health and eye disease issues.
- Give direction to messages and programs for target audiences.
- Guide future program planning, research, and evaluation.

Methodology and Analysis

The 2005 KAP Study was conducted nationwide and consisted of a randomly selected base sample of adults aged 18 and older and a supplemental sample of Asian adults in the same age group. The Asian oversample allows the survey to generate valid estimates for the U.S. population. A total of 3,180 adults responded to the survey, 272 of which were in the Asian oversample.

To create the 2005 KAP survey instrument, NEI and LCIF formed a work group composed of nationally recognized eye health professionals, survey methodologists, and statisticians to review the 1991 KAP survey, consider the overall purpose of the 2005 KAP survey, and recommend modifications to the 1991 KAP survey instrument.

The resulting survey included a variety of questions about KAP related to eye health and eye disease that are divided into the following seven sections:

1. General Health
2. Eye Health
3. Eye Examinations: Experiences and Attitudes
4. Knowledge About Eye Disease
5. Information Sources
6. Insurance
7. Demographic Information

Before it was administered, the survey was tested with random members of the target audience and modifications were made. The final version of the questionnaire contained 124 items. To view the questionnaire in English and Spanish, see Appendix A.

The survey was administered using a computer-assisted telephone interview (CATI) program for nearly 12 weeks between October 20, 2005, and January 11, 2006. It was offered in English (3,066 interviews) and Spanish (114 interviews), and interviews averaged 17 minutes in length. After the data collection period ended, the data were weighted in a multistage process using 2000 U.S. Census data so as to be representative of the resident U.S. population.

For more information about the sampling design, questionnaire development and design, institutional review board, interviewer training, data collection protocol, survey implementation, data collection quality control and monitoring, data management, data analysis, and response rates, see Appendix B.

Reading and Understanding Results

The survey results presented in the chapters that follow are self-reported; that is, survey respondents provided answers to questions they were asked in the telephone interview. As such, these data are descriptive of the knowledge,

attitudes, and reported practices of the adults who agreed to participate in this survey. No attempt was made to cross-reference respondents' self-reported health condition with medical records.

Chapter 2 presents information on the survey sample size, and participant demographics and their general health practices. Chapters 3 through 6 provide information on respondents' KAP in areas specific to eye health and eye disease. Some of the data reported in the following chapters are presented by gender, race/ethnicity, age group, education level, annual household income level, and health care insurance status to allow the reader to compare and contrast findings across population subgroups. Racial and ethnic categories are mutually exclusive. For readers requiring more information, Appendix C provides responses to individual survey questions by race and ethnic group.

As appropriate, 2005 data are compared with identical or similar data gathered in 1991. Although the 1991 data cannot be completely adjusted for statistical comparisons with the 2005 data, there are several noteworthy differences between the 1991 and 2005 data. These data are presented in text boxes that follow the discussion of the corresponding 2005 data. Chapter 7 presents a summary of findings and recommendations for future eye health and eye disease education and awareness efforts.

Throughout the chapters that follow, the percentage of respondents answering each question is reported. In cases where percentages are calculated separately for selected subgroups (e.g., men and women) and where there is sufficient statistical evidence demonstrating that the subgroups are different (e.g., men and women responded differently), the probability that the groups' responses are different is presented in a footnote (expressed as a p-value). The p-value represents the probability that the highest and lowest percentages reported are statistically different. To reduce the number of probability statements reported and reduce confusion, we use three probability levels to classify all of the statistically significant differences: $p < .05$, $p < .01$, and $p < .001$. These p-values are indicated in the text using the following superscripts: ^a $p < .05$, ^b $p < .01$, and ^c $p < .001$. No corrections were made for multiple comparisons.

All reported findings have been weighted to make them representative of the gender, race/ethnicity, age, geographical region, and education distributions of all adults (aged 18 and older) using the 2000 U.S. Population Census (as noted in Appendix B). As such, we report estimates of the percentages of all U.S. adults aged 18 and older based on the responses of survey respondents. Furthermore, where race and ethnicity subgroup comparisons are presented, responses for

these survey questions have been adjusted to control the effect of different age distributions for Caucasians, Blacks, Asians, and Hispanics. This age-adjustment procedure uses the 2000 Standard Population distribution for adults 18 years and older (see Appendix B).

To quantify the prevalence of themes and concepts, the following terms were used: “few,” “some,” “many,” and “most.” The term “few” is used to convey that less than 15% of adults identify or mention a particular theme or concept. The term “some” is used to convey that 15% to 39% of adults identify or mention a particular theme or concept. The term “many” is used to convey that 40% to 79% of adults identify or mention a particular theme or concept. This term is often used to describe multiple subpopulations simultaneously that all fit the criteria. Lastly, the term “most” is used to convey the highest percentage or that 80% or more of adults identify or mention a particular theme or concept. This categorization will serve as the framework for presenting and analyzing the study findings in the following chapters.

The appendices contain additional information about the qualifications of interviewers (Appendix D), the confidentiality agreement (Appendix E), the interviewer training manual (Appendix F), the summary of non-response error analysis (Appendix G), error margins for selected variables and item response scenarios (Appendix H), frequency distributions of 2005 KAP variables for adults aged 18 and older (weighted) (Appendix I), and issues for consideration for future research (Appendix J).

Limitations

The 2005 KAP Study is not without limitations. Several issues arose during survey fielding that may have impacted the study’s findings and present issues for consideration when conducting similar studies in the future. Study limitations include:

- For the 2005 KAP survey, only residential phone numbers were eligible to be called. Respondents who only have wireless phones were not captured as potential respondents.
- There are several noteworthy changes between the 1991 and 2005 KAP Studies. However, no statistical tests are possible with the 1991 data.

- The language contained in the survey introduction immediately introduced LCIF as the sponsor of an important study. Respondents may have reacted to the introduction and the mention of LCIF with the impression that they were being solicited by LCIF for a donation.
- Long exhaustive lists of pre-coded responses were used for survey questions. Long lists may interrupt the flow of the interview as the interviewer reviews the list of responses to match the response.
- The KAP was fielded in late October and coincided with three major holidays—Thanksgiving, Christmas, and New Year’s.

For a more detailed description of the limitations of this study and issues for consideration, please see Appendix J.

References

- Age-Related Eye Disease Study Research Group. (2001). A randomized, placebo-controlled, clinical trial of high-dose supplementation with vitamins C and E, beta carotene, and zinc for age-related macular degeneration and vision loss. *Archives of Ophthalmology*, 119(10), 1439–1452.
- Congdon, N., O’Colmain, B., Klaver, C. C. W., Klein, R., Muñoz, B., Friedman, D., et al. (2004a). Causes and prevalence of visual impairment among adults in the United States. *Archives of Ophthalmology*, 122(4), 477–485.
- Congdon, N., Vingerling, J. R., Klein, B. E., West, S., Friedman, D. S., Kempen, J., et al. (2004b). Prevalence of cataract and pseudophakia/aphakia among adults in the United States. *Archives of Ophthalmology*, 122(4), 487–494.
- Friedman, D., O’Colmain, B., Muñoz, B., Tomany, S., McCarty, C., de Jong, P., et al. (2004a). Prevalence of age-related macular degeneration in the United States. *Archives of Ophthalmology*, 122(4), 564–572.
- Friedman, D., Wolfs, R. C. W., O’Colmain, B. J., Klein, B. E., Taylor, H., West, S., et al. (2004b). Prevalence of open-angle glaucoma among adults in the United States. *Archives of Ophthalmology*, 122(4), 532–538.
- Kempen, J. H., O’Colmain, B. J., Leske, M. C., Haffner, S. M., Klein, R., Moss, S. E., et al. (2004). The prevalence of diabetic retinopathy among adults in the United States. *Archives of Ophthalmology*, 122(4), 552–563.
- National Eye Institute (NEI). (1992). National Eye Health Education Program (NEHEP) survey of public knowledge, attitudes, and practices (KAP) related to eye health. Bethesda, MD: NEI.
- Varma, R., Torres, M., Peña, F., Klein, R., & Azen, S. P.; Los Angeles Latino Eye Study Group. (2004a). The prevalence of diabetic retinopathy in adult Latinos: The Los Angeles Latino Eye Study. *Ophthalmology*, 111(7), 1298–1306.
- Varma, R., Ying-Lai, M., Francis, B. A., Bao-Thu Nguyen, B., Deneen, J., Wilson, R., et al. (2004b). Prevalence of open-angle glaucoma and ocular hypertension in Latinos. The Los Angeles Latino Eye Study. *Ophthalmology*, 111(8), 1439–1448.

Varma, R., Torres, M., Los Angeles Latino Eye Study Group. (2004c). Prevalence of lens opacities in Latinos: The Los Angeles Latino Eye Study. *Ophthalmology*, 111(8), 1449–1456.

Vitale, S., Cotch, M. F., & Sperduto, R. D. (2006). Prevalence of visual impairment in the United States. *The Journal of the American Medical Association*, 95(18), 2158–2163.

CHAPTER 2: GENERAL INFORMATION

This chapter presents an overview of the 3,180 respondents who participated in the 2005 Survey of Public Knowledge, Attitudes, and Practices Related to Eye Health and Disease. Demographic information about the group is addressed, including age, gender, marital status, race/ethnicity, level of education, annual household income, insurance status, and geographic region of the United States where they reside. Information is also provided about the state of their overall health and health practices and attitude with regard to various disabilities.

Overview of Survey Respondents

Demographics

A total of 3,180 adults aged 18 and older responded to the survey. The base target was specified at 2,400 interviews, which was exceeded by 129 interviews. An Asian oversample target was specified at 200 interviews, which was exceeded by 72 Asian interviews and another 379 non-Asian interviews that were obtained as a result of conducting the Asian oversample. The data in Table 2-1 reflect these totals by including the base sample (n=2,908) and the supplemental survey of Asians (n=272). Data presented in this chapter are weighted to U.S. population parameters (see Appendix B for discussion about weighting methods).

Respondents' ages range from 18 to 99 years (with an average age of 46 years). Slightly more respondents are female (52%) than male (48%). Sixty percent (60%) of respondents say they are married, 22% say they are single (never married), 12% say they are divorced or separated, and the remaining 6% say they are widowed. When asked to identify their race/ethnicity, 73% self-identify as Caucasian, 11% as being of Hispanic origin or descent, 10% as Black or African American (referred to as Black from this point on), 4% as Asian, and the remaining 2% as another race (American Indian and Alaska Native, Native Hawaiian and Other Pacific Islander, or other). For the purposes of this report, the remaining 2% of other races are not reported.²

Respondents were asked what their final level of education completed in school was (see Table 2-1). Nineteen percent (19%) have some high school education, 29% have a high school diploma or equivalent, 29% have some college, and the remaining 23% have a college degree or more education (e.g., started or

² The 2% of other races is included in the totals.

completed graduate school). Respondents were also asked to identify their total household income before taxes in 2004 (not adjusted for family size). Response categories range from less than \$10,000 to \$200,000 and more. For the purposes of this analysis, responses are collapsed into four categories. Eighteen percent (18%) of respondents report that their 2004 total household income was \$14,999 or less. Twenty-five percent (25%) of the respondents say their household income was between \$15,000 and \$34,999, and 33% say their household income was between \$35,000 and \$74,999. Twenty-four percent (24%) of the respondents say their household income was \$75,000 or greater.

Finally, respondents were asked if they had any kind of health care coverage, including private health insurance, prepaid plans such as health maintenance organizations, or government plans such as Medicare. Eighty percent (80%) of respondents say that they have some form of health care coverage, 20% have none, and 1% do not know.

**Table 2-1: Characteristics of Adults
(N=3,180)**

Profile	Value
Age, mean (range)	46 (18–99)
18-39 years	43%
40-64 years	41%
65+ years	17%
Gender	
Male	48%
Female	52%
Marital Status	
Married	60%
Divorced	12%
Widowed	6%
Single (never married)	22%
Race*	
Hispanic	11%
Asian	4%
Black	10%
Caucasian	73%
Other	2%
Education	
Some high school	19%
High school graduate	29%
Some college	29%
College or more education	23%
Income	
< \$15,000/yr	18%
\$15,000–\$34,999/yr	25%
\$35,000–\$74,999/yr	33%
\$75,000+/yr	24%

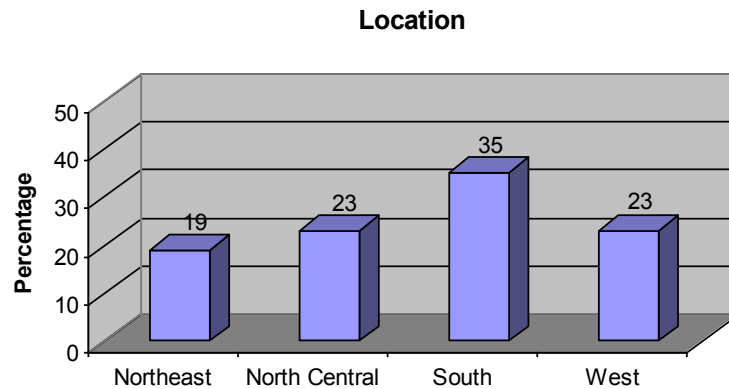
Profile	Value
Insurance status**	
Insured	80%
Not insured	20%
Don't know	1%

* The race/ethnicity categories are mutually exclusive.

** Percentages will not total to 100% due to rounding.

On the basis of the telephone exchange dialed, each completed interview was coded for state, geographic region, and type of location (i.e., urban, suburban, or rural).³ Telephone interviews were completed in all 50 states and the District of Columbia. More adults are from the South (35%) than the North Central (23%), West (23%), or Northeast (19%) areas of the United States (see Figure 2-1).

Figure 2-1

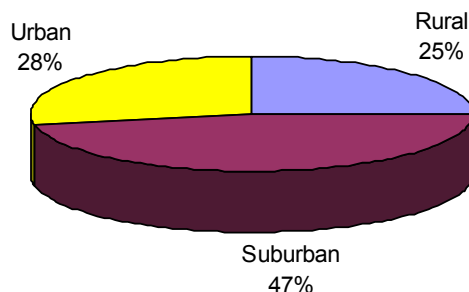


More adults report living in suburban areas (47%) than urban (28%) or rural (25%) areas (see Figure 2-2).

³ The Genesys sampling system was used to generate the list of random telephone numbers. Genesys assigns telephone exchanges based on the plurality of listed households, and it includes the following classification: 1=center of a metropolitan statistical area (MSA); 2=outside center city, but inside county containing center city; 3=inside a suburban county of the MSA; 4=in an MSA with no center city; and 5=not an MSA. These Genesys exchange classifications were applied to each telephone number in the sample. The following Metro Status Code was applied for each record in the data: 1=urban, 2-4=suburban, 5=rural. The Genesys system is licensed for use from Marketing Systems Group, Inc., Ft. Washington, PA.

Figure 2-2

Type of Geographic Location



General Health

Eighty-three percent of adults consider themselves to be in good, very good, or excellent health.

Eighty-three percent (83%) of adults describe their health as good, very good, or excellent. Eighty percent (80%) of adults report having some form of health care coverage (see Table 2-1). Adults aged 18 to 39 (89%) more often report their health as good, very good, or excellent than adults aged 40 to 64 (81%) and those aged 65 and older (72%).^c Asians (86%) and Caucasians (86%) more frequently report their general health as being good, very good, or excellent than Blacks (75%) and Hispanics (69%).^c

KAP Comparison

1991: 85% of adults report their general health as being good, very good, or excellent.

2005: 83% of adults report their general health as being good, very good, or excellent.

^c $p < .001$ (This represents the probability that the highest and lowest percentages compared are statistically different.)

Ninety-three percent of adults report visiting a health care provider (HCP) within the past two years.

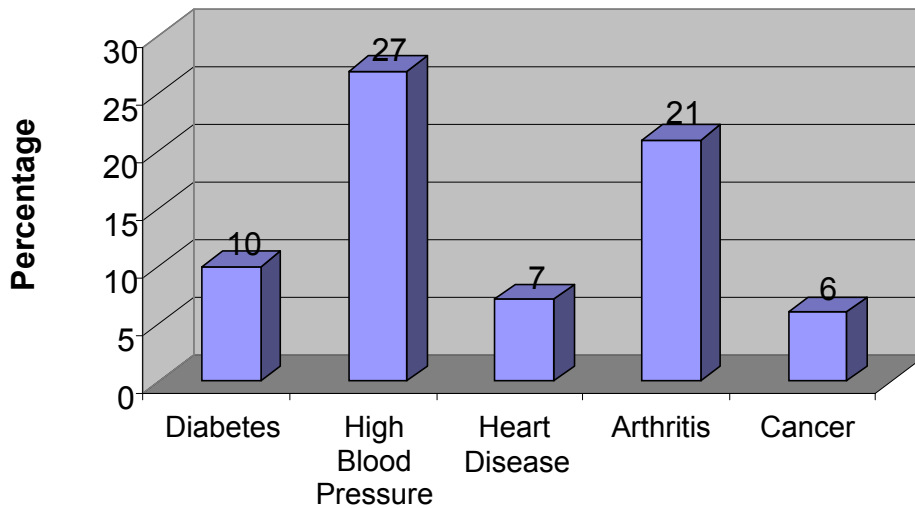
Of the 93% of adults who report visiting an HCP within the past two years, women (97%) more often report visiting an HCP within the past two years than men (88%).^c More adults aged 65 and older (57%) report visiting an HCP in the past month than adults aged 18 to 39 (34%) and those aged 40 to 64 (41%).^c Within the past two years, those with insurance (95%) report visiting an HCP more than those without insurance (82%).^c

Forty-three percent of adults report having been told by an HCP that they have a chronic health condition.

Forty-three percent (43%) of adults report having been told by an HCP that they have one or more chronic health conditions. Those chronic health conditions include high blood pressure (27%), arthritis (21%), diabetes (10%), heart disease (7%), and cancer (6%) (see Figure 2-3).

Figure 2-3

Percentage Reporting Having Been Told They Have a Chronic Disease by Disease Type



Of the 10% who report having diabetes, only 1% report also being told by their eye care provider (ECP) that they have diabetic retinopathy. More women (45%) than men (40%) report being told by an HCP that they have one or more chronic

conditions. Adults aged 65 and older (84%) more often report being told that they have one or more chronic conditions than adults aged 40 to 64 (49%) and four times more often than adults aged 18 to 39 (21%).^c

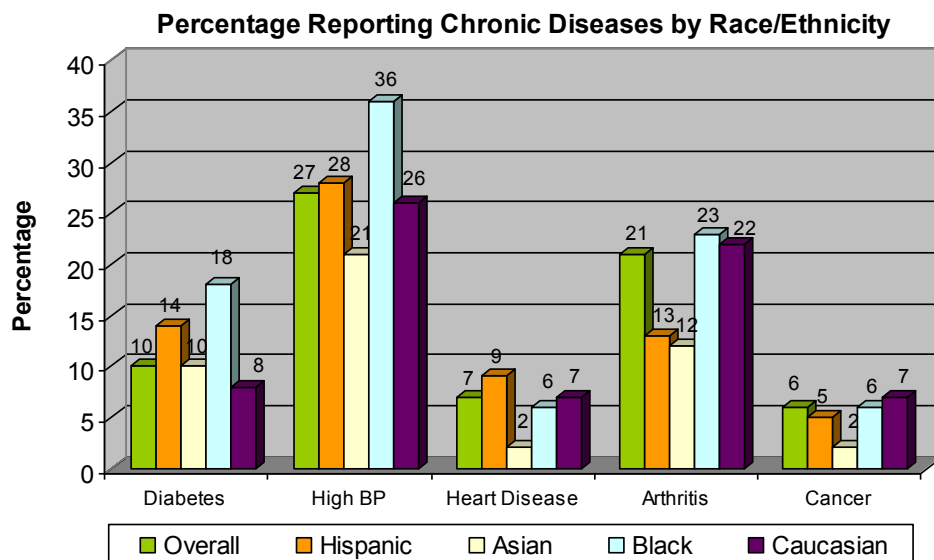
KAP Comparison

1991: Of the adults surveyed about chronic conditions, 5% of adults report being told they have diabetes, 19% high blood pressure, 7% heart disease, 22% arthritis, and 7% cancer.

2005: Of the adults responding to questions about chronic conditions, 10% of adults report being told they have diabetes, 27% high blood pressure, 7% heart disease, 21% arthritis, and 6% cancer.

Regarding racial and ethnic differences, Blacks (51%) and Caucasians (43%) more often report being told by an HCP that they have one or more chronic diseases than Hispanics (38%) and Asians (29%).^c Among people being told they have diabetes and people with high blood pressure, Blacks (18% and 36%, respectively) report more disease than other racial/ethnic groups (see Figure 2-4). Among people being told they have heart disease, arthritis, and cancer, Caucasians (7%, 22%, and 7%, respectively) report more disease than other racial/ethnic groups.

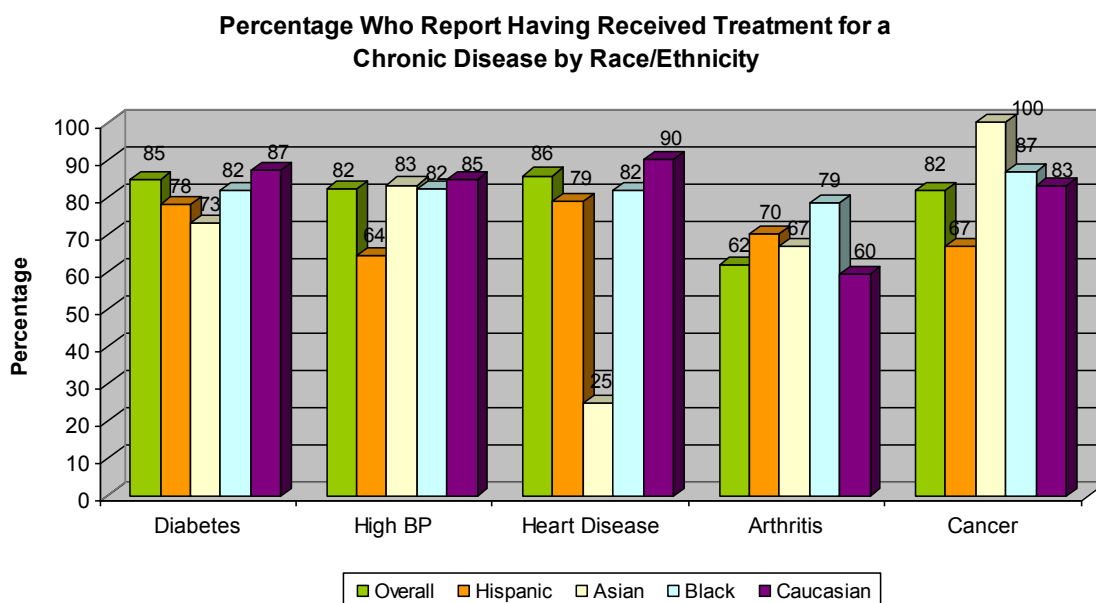
Figure 2-4



Most adults report seeking or receiving treatment for their chronic health condition(s).

Among those who report having a chronic condition, more than 80% of adults report seeking or receiving treatment for their particular condition: diabetes (85%), high blood pressure (82%), or heart disease (86%) (see Figure 2-5). Eighty-two percent (82%) of adults who report having cancer report seeking or receiving treatment for it. Only 62% of all adults report seeking or receiving treatment for arthritis. Among these adults, 69% of women and 50% of men report seeking or receiving treatment for arthritis. Eighty-nine percent (89%) of women and 74% of men report seeking or receiving treatment for high blood pressure. More men report seeking or receiving treatment for heart disease (96%) than women (77%).^c

Figure 2-5



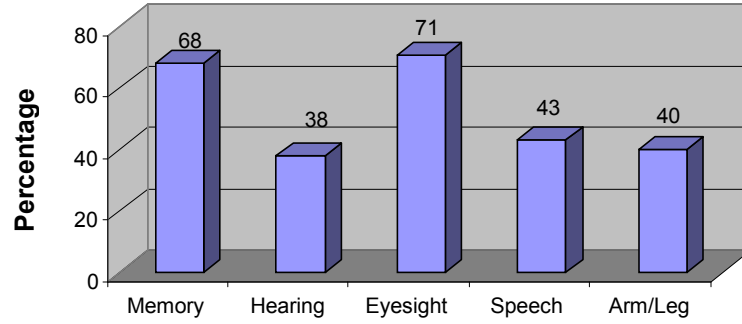
Seventy-one percent of adults report that loss of eyesight would have the greatest impact on their daily life.

When asked to think about certain conditions that would affect their day-to-day living, 71% of adults report loss of eyesight as a 10 on a scale of 1 to 10, with 10 indicating greatest impact (see Figure 2-6). Sixty-one percent (61%) of Asians, 71% of Hispanics, 72% of Caucasians, and 74% of Blacks report a rating of 10 for loss of eyesight.^b The percentage of adults who rate loss of eyesight as having the greatest impact on their lives was lower among those with a college degree or more education (64%) than adults with some college education (73%), a high school diploma (73%), or less than a high school education (76%).^c Other conditions and the percentages of adults reporting a 10 include loss of memory (68%), loss of speech (43%), loss of an arm or leg (40%), and loss of hearing (38%). For each condition that would affect day-to-day living, it was possible for a respondent to rate each condition as a 10.

^b $p < .01$ (This represents the probability that the highest and lowest percentages compared are statistically different.)

Figure 2-6

Percentage of Adults Who Rate Different Conditions as a 10 on a Scale of 1 to 10 (10=greatest impact)



CHAPTER 3: EYE HEALTH

This chapter provides information on the number of adults that use eyewear, such as glasses or contact lenses, the effect of this use on vision quality, and the reasons why the eyewear is used. This chapter also addresses how adults judge the quality of their vision (i.e., excellent, very good, good, fair, poor), reasons for receiving follow-up eye care or treatment, and experience with eye injury or trauma.

Sixty-six percent of adults report wearing some type of eyewear.

Sixty-six percent (66%) of adults report wearing some type of eyewear, including glasses, contact lenses, both glasses and contact lenses, or reading glasses only (see Table 3-1).

Table 3-1: Percentage of Adults Reporting Use of Eyewear, by Type

Type of Eyewear	Percentage
Glasses	40%
Contact lenses	2%
Both glasses and contact lenses	10%
Reading glasses only	14%
None	34%

Sixty-eight percent (68%) of those using some type of eyewear report that their health care coverage and/or vision insurance pays for some part of the cost of glasses or contact lenses. Forty-two percent (42%) of those wearing some type of eyewear are unsure whether or not the cost was covered by insurance.

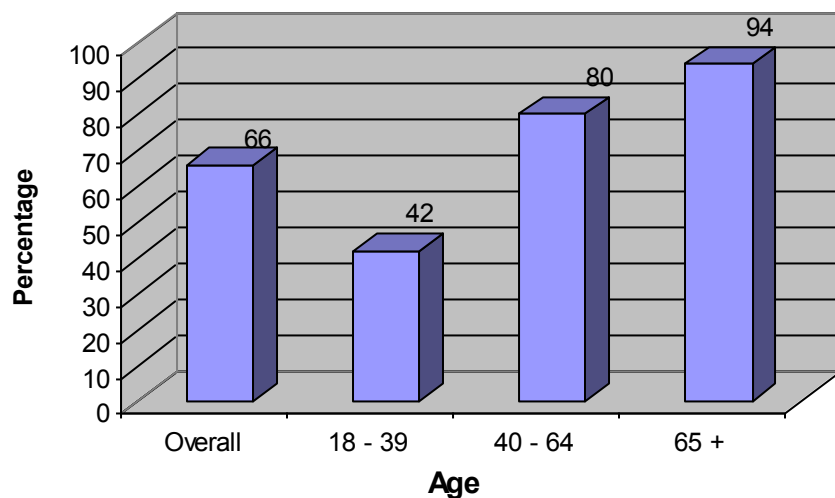
More women (72%) report using eyewear than men (60%).^b Hispanics (46%) report far less use of eyewear compared with Caucasians (70%), Asians (72%), and Blacks (64%).^c Older adults (94% of adults aged 65 and older) significantly report using eyewear more than younger adults (42% of adults aged 18 to 39) (see Figure 3-1).

^b p<.01

^c p<.001

Figure 3-1

Percentage Who Report Wearing Eyewear by Age



KAP Comparison

1991: 66% of adults say they use glasses or contact lenses.

2005: 66% of adults say they use some type of eyewear.

Adults with more education also report greater use of eyewear than adults with less education. Among adults with a college degree or more education, 73% report using eyewear compared with 52% of adults with less than a high school diploma who report using eyewear.^c Seventy-one (71%) of insured adults report using some type of eyewear compared with 47% of uninsured adults.^c

More adults report wearing eyewear to view objects that are close up and more distant than to view objects that are at an intermediate distance.

Among the 66% of adults who report wearing some type of eyewear, more adults report using eyewear to view objects that are close up, such as while sewing or reading (75%), than to view objects at an intermediate distance, such as a computer or looking at themselves in a mirror (59%), and more distant, such as while driving or watching television (70%). When asked whether they used eyewear to view objects close up, more adults aged 65 and older (91%) report doing so than adults aged 40 to 64 (80%) and adults aged 18 to 39 (50%) (see

Table 3-2).^c Reports for use of eyewear to view objects at a distance do not follow the same pattern by age. Adults aged 18 to 39 (83%) indicate higher use of eyewear to see distant objects than adults aged 40 to 64 (64%) and adults aged 65 and older (70%).^c

Table 3-2: Percentage Reporting Use of Eyewear to View Objects that Are Close Up, at an Intermediate Distance, or More Distant, by Age

Age	Close up	Intermediate	Distant
18–39	50%	56%	83%
40–64	80%	58%	64%
65+	91%	66%	70%

* Percentages will not total to 100% due to individual respondents providing multiple answers.

Fifty-eight percent (58%) of Asian, 68% of Hispanic, 70% of Black, and 70% of Caucasian adults report using eyewear to view objects close up.^a Eighty-two percent (82%) of Asian adults report using eyewear to view objects that are more distant, compared with 74% of Black, 73% of Caucasian, and 66% of Hispanic adults^b (see Table 3-3). All race and ethnicity groups least frequently report using eyewear for viewing objects at an intermediate distance (such as working on a computer).

Table 3-3: Percentage Reporting Use of Eyewear to View Objects that Are Close Up, at an Intermediate Distance, or More Distant, by Race/Ethnicity

Race*	Close up	Intermediate	Distant
Hispanic	68%	49%	66%
Asian	58%	56%	82%
Black	70%	56%	74%
Caucasian	70%	59%	73%

* The race/ethnicity categories are mutually exclusive.

** Percentages will not total to 100% due to individual respondents providing multiple answers.

Ninety-two percent of adults who wear eyewear report that an eye care provider (ECP) prescribed or recommended the eyewear they currently use.

Of the 66% of adults who report wearing some type of eyewear, 92% report that the glasses or contact lenses they currently use were prescribed or recommended by an ECP (i.e., an eye doctor or eye specialist, such as an ophthalmologist or optometrist). Adults aged 18 to 39 (96%) and those aged 65 and older (95%)

^a p<.05 (This represents the probability that the highest and lowest percentages compared are statistically different.)

more often report that an ECP prescribed the eyewear they currently use than adults aged 40 to 64 (89%).^c

Ninety percent of adults wearing eyewear report their eyesight as good, very good, or excellent.

Among the 66% who report using some type of eyewear, 90% of adults report their eyesight as good, very good, or excellent when wearing their glasses or contact lenses.⁴ As age increases, the number of adults reporting good, very good, or excellent eyesight decreases regardless of whether they wear or do not wear eyewear (see Table 3-4). Ninety-four percent (94%) of adults aged 18 to 39 report their eyesight as good, very good, or excellent compared with 91% of adults aged 40 to 64 and 85% of adults aged 65 and older.^c

Table 3-4: Percentage Reporting Good, Very Good, or Excellent Eyesight, by Use of Eyewear

Age (years)	Adults Who Use Eyewear	Adults Who Do Not Use Eyewear
18–39	94%	89%
40–64	91%	85%
65+	85%	60%

Adults with less education or an annual household income below \$15,000 less frequently report their eyesight when wearing glasses or contact lenses as good, very good, or excellent.^c

KAP Comparison

1991: 87% of adults report their eyesight as good or excellent when using their eyewear.

2005: 90% of adults report their eyesight as good, very good, or excellent when using their eyewear.

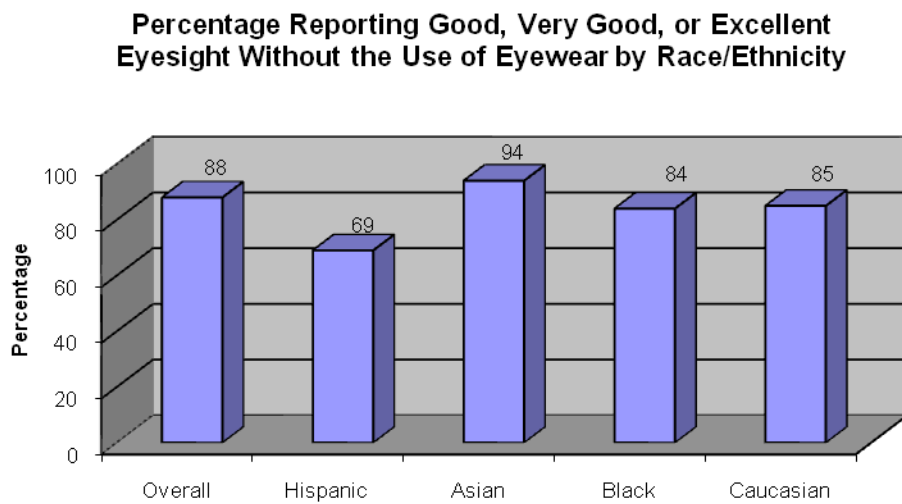
Eighty-eight percent of adults who do not wear eyewear report their eyesight as good, very good, or excellent.

Among the 34% of adults who do not wear some type of eyewear, 88% report their eyesight as good, very good, or excellent. More women (92%) than men

⁴ *Good, Very Good, and Excellent* were the top three ratings on a 5-point scale, which also included *Fair* and *Poor*, provided to respondents to describe the quality of their eyesight.

(85%) who do not wear eyewear report their eyesight as good, very good, or excellent.^c Forty percent (40%) of adults aged 65 and older report their eyesight without glasses or contacts as fair or poor more often than those aged 40 to 64 (15%) and those aged 18 to 39 (11%).^c Those who are insured (92%) more frequently report their eyesight as good, very good, or excellent than those who are uninsured (78%).^c Asian (94%), Caucasian (85%), and Black (84%) adults who do not wear eyewear more frequently report their eyesight as good, very good, or excellent compared with Hispanics (69%) (see Figure 3-2).^c

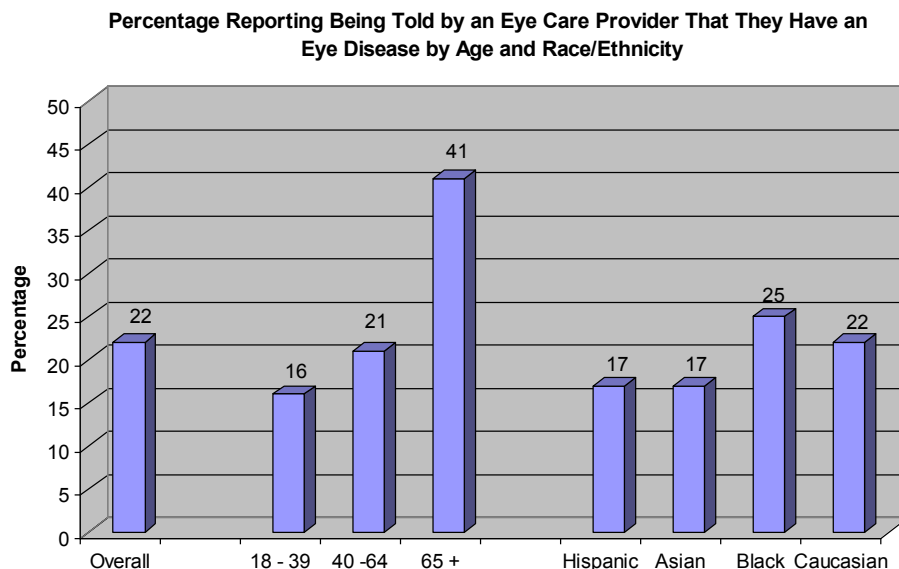
Figure 3-2



Twenty-two percent of adults report ever being told by an ECP that they have an eye condition or disease.

Among adults, 22% report ever being told by an ECP that they have an eye condition or disease. Twenty-four percent (24%) of women report ever being told they have an eye condition or disease compared with 20% of men.^b The percentage of adults reporting ever being told by an ECP that they have an eye disease or condition increased with age (see Figure 3-3). Adults aged 65 and older report ever being told they have an eye condition or disease two and a half times more often than the number of adults aged 18 to 39 who were ever told they have an eye condition or disease.^c Blacks (25%) and Caucasians (22%) more often report having been told by an ECP that they have an eye disease than Asians (17%) and Hispanics (17%).^a

Figure 3-3



KAP Comparison

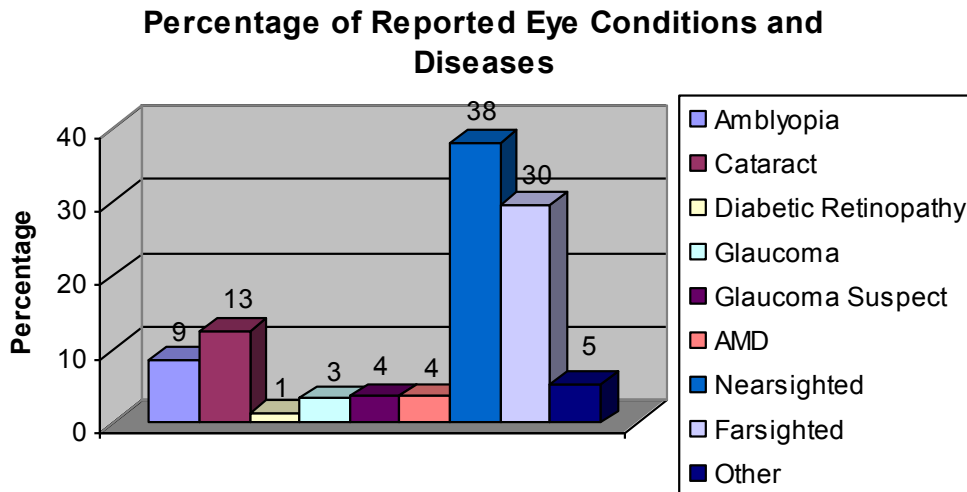
1991: 18% of adults report ever being told by an ECP that they have an eye condition or disease.

2005: 22% of adults report ever being told by an ECP that they have an eye condition or disease.

More adults report being told by an ECP that they are nearsighted or farsighted more than any other eye condition or disease.

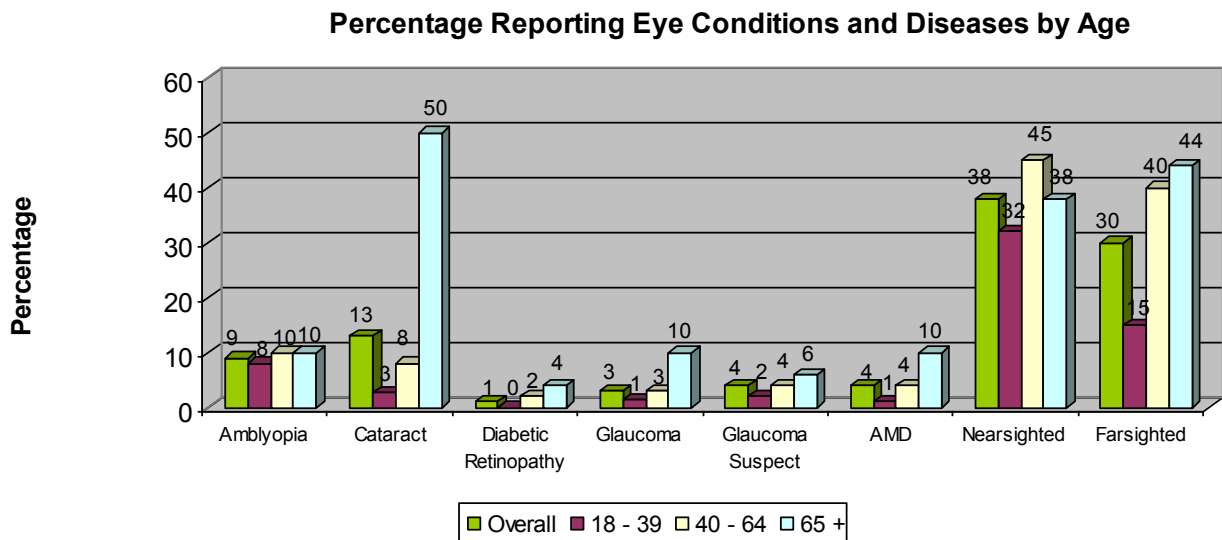
While adults report relatively low rates of several major eye diseases and conditions, 38% report being told by an ECP that they are nearsighted, while 30% report being told they are farsighted (see Figure 3-4). Findings for other eye diseases and conditions include cataract (13%), amblyopia (9%), glaucoma suspect (4%), age-related macular degeneration (AMD) (4%), glaucoma (3%), and diabetic retinopathy (1%).

Figure 3-4



With the exception of nearsightedness and amblyopia, the percentage of adults who report being told by an ECP that they have an eye condition or disease increases as age increases (see Figure 3-5).⁵ The most dramatic example of this is in the reporting of cataract, which increases from 8% of adults aged 40 to 64 to 50% of those aged 65 or older.

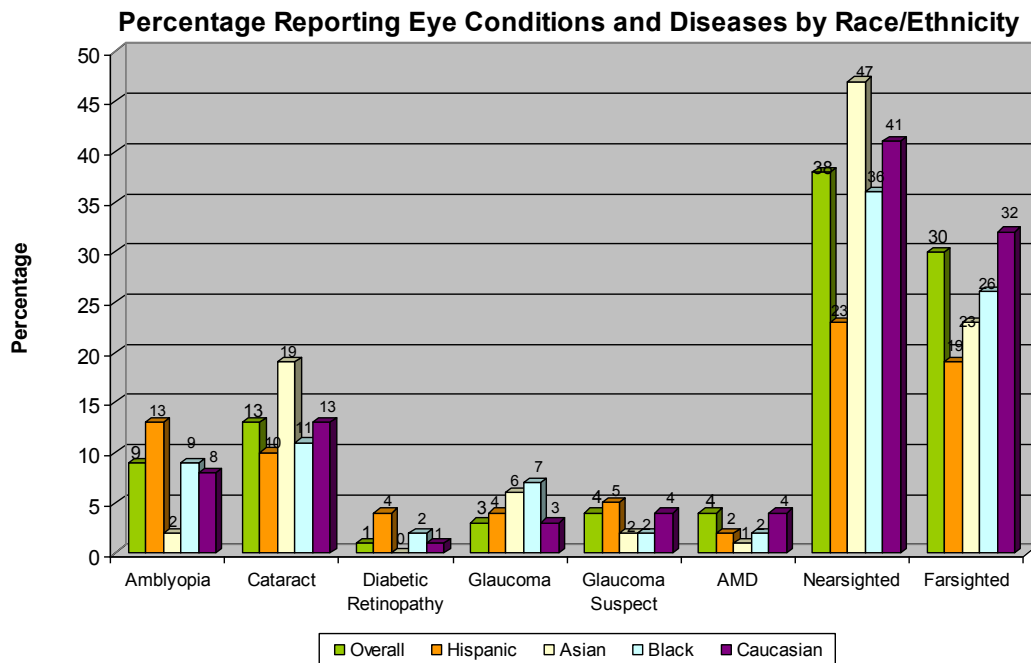
Figure 3-5



⁵ Amblyopia is the only condition with no statistically significant difference between age groups. For all other conditions, $p < .001$.

Regarding race and ethnicity, Hispanics (13%), Blacks (9%), and Caucasians (8%) report higher rates of amblyopia compared with Asians (2%) (see Figure 3-6).^c For cataract, Asian adults (19%) report higher rates compared with Caucasian (13%), Black (11%) and Hispanic (10%) adults.^b Rates of diabetic retinopathy are reported to be low and consistently distributed across all racial and ethnic groups: Hispanics (4%), Blacks (2%), Caucasians (1%), and Asians (0%). Blacks (7%) and Asians (6%) report higher rates of glaucoma compared with Hispanics (4%) and Caucasians (3%).^b Five percent (5%) of Hispanics, 4% of Caucasians, 2% of Asians, and 2% of Blacks report being told that they are glaucoma suspect.^a Four percent (4%) of Caucasians, 2% of Blacks, 2% of Hispanics, and 1% of Asians report being told that they have AMD.^b Asians (47%) and Caucasians (41%) report higher rates of nearsightedness compared with Blacks (36%) and Hispanics (23%).^c Lastly, Caucasians (32%) report higher rates of farsightedness compared with Blacks (26%), Asians (23%), and Hispanics (19%)^c (see Figure 3-6).

Figure 3-6



KAP Comparison

1991: The following rates for eye disease and conditions were observed: cataract (35%), glaucoma (11%), and nearsightedness (11%).

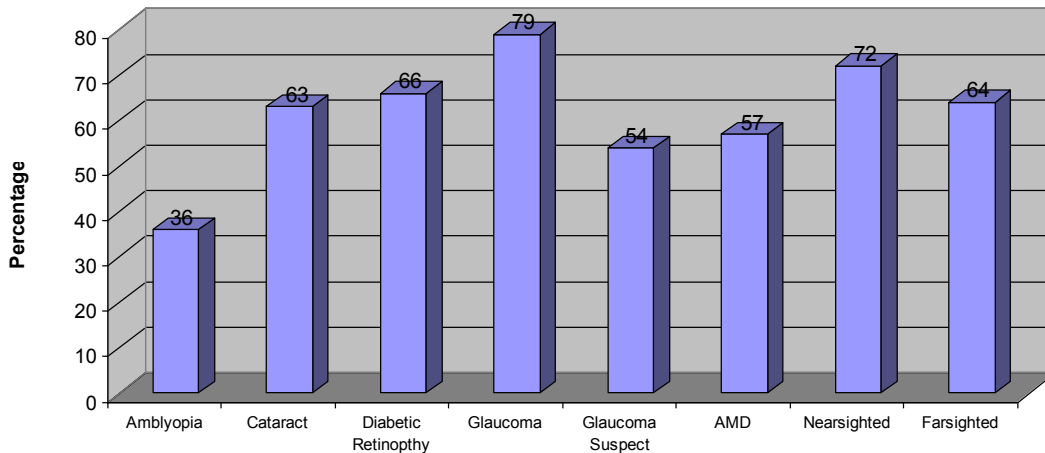
2005: The following rates for eye disease and conditions were observed: cataract (13%), glaucoma (3%), and nearsightedness (38%).

Many adults report receiving follow-up care or treatment for eye disease and conditions.

Among the 22% who report having an eye disease or condition, more adults report receiving follow-up care for glaucoma (79%) than any other eye disease or condition (see Figure 3-7). Approximately one out of every three persons with cataract, diabetic retinopathy and farsightedness do not receive follow-up care. Follow-up care was least frequently obtained for adults reporting amblyopia (36%), glaucoma suspect (54%), and AMD (57%).

Figure 3-7

Percentage Reporting Receiving Follow-up Care for Eye Disease and Conditions



For amblyopia, cataract, glaucoma, glaucoma suspect, nearsightedness, and farsightedness, as age increases, the number of adults who report receiving follow-up care increases.⁶

Women more than men report receiving follow-up care for amblyopia (49% and 25%, respectively), cataract (69% and 55%, respectively), diabetic retinopathy (74% and 59%, respectively), glaucoma suspect (62% and 48%, respectively), nearsightedness (77% and 65%, respectively), and farsightedness (73% and 50%, respectively).⁷ Eighty-two percent (82%) of men and 78% of women report receiving follow-up care for glaucoma. Fifty-eight percent (58%) of men and 56% of women report receiving follow-up care for AMD.

Most adults report never having had an eye injury or eye trauma.

Eighty-one percent (81%) of adults report never having had an eye injury or eye trauma requiring a doctor's care either in the emergency room or at a doctor's office. Among the 19% who report having had an eye injury or trauma, more men (25%) than women (14%) report having had an eye injury or trauma.^c Adults aged 40 to 64 (21%) more often report having had eye injuries than adults aged 18 to 39 (19%) and adults aged 65 and older (13%).^c Caucasians (21%) more often report having had an eye injury or eye trauma than Blacks (15%), Hispanics (9%), and Asians (5%).^c

Most reported eye injuries or eye trauma occur on the job or in the workplace.

Among the 19% of adults who report having had an eye injury or eye trauma, the locations where the most recent eye injury occurred include on the job or in the workplace (20%), in the home (14%), or while playing sports/recreational activities (12%) (see Table 3-5). Thirty-nine percent (39%) of adults report "other" for how an injury took place, including such events as "hit in the eye with stone," "plastic in the eye," and "my kidneys stopped working."

⁶ Glaucoma and farsightedness are the only conditions/diseases with no statistically significant difference between age groups. For all other conditions, the p-value ranged from p<.05 for amblyopia to p<.001 for cataract.

⁷ There were no statistically significant differences between women and men for diabetic retinopathy, glaucoma, glaucoma suspect, and AMD. Differences between women and men for the other conditions/diseases range from p<.01 for cataract to p<.001 for farsightedness.

**Table 3-5: Percentage Reporting Most Recent Eye Injury/
Eye Trauma by Location Where the Injury
Was Sustained**

Location of Injury/Trauma	Percentage
Job or Workplace	20%
In the Home	14%
Playing Sports/Recreational Activity	12%
Working on a Hobby	7%
Motor Vehicle	4%
While Gardening/Lawn Care	3%
Other	39%

More men (29%) report injuries on the job than women (4%).^c More women (24%) report injuries in the home than men (8%).^c Twenty-five percent (25%) of adults aged 65 and older, 24% of adults aged 40 to 64, and 13% of adults aged 18 to 39 report on-the-job injuries.

Twelve percent of adults experiencing an eye injury or eye trauma have experienced a permanent change in their vision or permanent vision loss because of their most recent eye injury or eye trauma.

Of the 19% of adults who report having had an eye injury or eye trauma, 12% report experiencing a permanent change in their vision or permanent vision loss as a result of their most recent incident. Thirteen percent (13%) of women and 10% of men report a permanent loss of vision. Among the 19% of adults who report having an eye injury or eye trauma, 10% report having to stay overnight in a hospital as a result of their most recent eye injury or eye trauma.

CHAPTER 4: EYE EXAMINATIONS

This chapter presents results from the 2005 KAP Study about adults' experiences and attitudes related to eye examinations.

Ninety-one percent of adults report having had their eyes examined sometime in the past by a health care provider (HCP).

Ninety-one percent (91%) of adults report having had their eyes examined by an HCP. An HCP can be a primary care provider (PCP) or an eye care provider (ECP). More women (94%) report having had their eyes examined than men (88%).^c Adults aged 65 and older (94%) most often report having their eyes examined, followed by adults aged 40 to 64 (93%) and adults aged 18 to 39 (89%).^c Both Blacks (95%) and Caucasians (94%) more often report having had their eyes examined than Asians (87%) and Hispanics (73%).^c Adults with any kind of health insurance (94%) more often report having had their eyes examined by an HCP than those without such coverage (80%).^c Adults with an annual household income of \$35,000 or more or at least some post-high school education report receiving an eye exam by an HCP more often than those with lower household incomes and less education (see Tables 4-1 and 4-2).^c

Table 4-1: Percentage Reporting Having Had an Eye Exam by an HCP, by Annual Household Income

Level of Income	Percentage
<\$14,999	84%
\$15,000 to \$34,999	89%
\$35,000 to \$74,999	95%
\$75,000+	96%

Table 4-2: Percentage Reporting Having Had an Eye Exam by an HCP, by Level of Education

Level of Education	Percentage
<HS	82%
HS diploma	89%
Some college	96%
College degree +	97%

^c p<.001

Seventy-six percent of adults who report having had their eyes examined by an HCP have had a dilated eye examination.

Among the 91% of adults who report having had their eyes examined by an HCP, 76% report having had their pupils dilated during an eye examination. Ninety-two percent (92%) of adults with diabetes report having had their eyes examined by an HCP. Among these, the vast majority (94%) say their pupils were dilated during the eye exam.

More women (81%) report having had their eyes dilated during an eye examination than men (71%).^c Ninety-four percent (94%) of adults aged 65 and older report having had their eyes dilated compared with 84% of adults aged 40 to 64 and 60% of adults aged 18 to 39.^c

Rates of dilated eye examinations differ by race and ethnicity. Among the 91% of adults who report having had their eyes examined, more Caucasians (79%) report having had eye examinations with dilated pupils than Asians (75%), Blacks (70%), and Hispanics (61%).^c Adults with annual household incomes of \$35,000 or more or at least some post-high school education report receiving dilated eye examinations more often than those with lower household incomes and less education (see Tables 4-3 and 4-4).^c

Table 4-3: Percentage Reporting Having Had a Dilated Eye Exam, by Annual Household Income

Level of Income	Percentage
<\$14,999	70%
\$15,000 to \$34,999	71%
\$35,000 to \$74,999	78%
\$75,000+	80%

Table 4-4: Percentage Reporting Having Had a Dilated Eye Exam, by Education Level

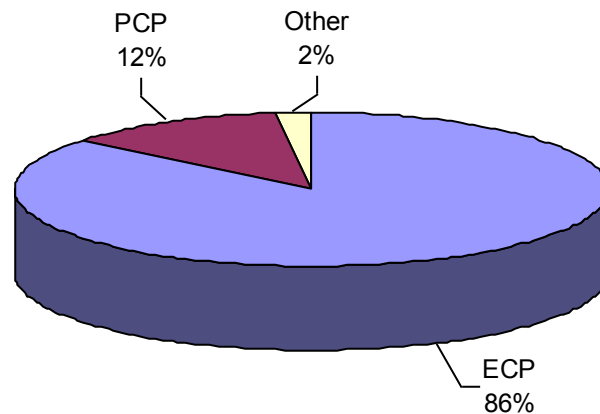
Level of Education	Percentage
<HS	64%
HS diploma	76%
Some college	78%
College degree +	83%

Eighty-six percent of adults who report having had their eyes examined by some type of HCP report that it was done by an ECP.

Among the 91% of adults who report having had their eyes examined by some type of HCP, 86% report going to an ECP and 12% report going to their PCP (see Figure 4-1).

Figure 4-1

Percentage of Adults Who Report Having Had Their Eyes Examined by Type of Provider



Among those adults who report having diabetes and having had their eyes examined by an HCP, 90% report having had an ECP examine their eyes and 9% report having had a PCP examine their eyes.

Women more frequently report having had their eyes examined by an ECP (90%) than men (78%).^c Asians (83%) and Caucasians (86%) more frequently report having had their eyes examined by an ECP than Hispanics (82%) and Blacks (77%),^c yet 16% of Blacks, 14% of Hispanics, 11% of Caucasians, and 9% of Asians report having had their eyes examined by PCPs. Ninety-three percent (93%) of adults aged 65 and older report having had their eyes examined by an ECP compared with 88% of adults aged 40 to 64 and 78% of adults aged 18 to 39.^c More adults who have a high school diploma (85%), some college (86%), or a college degree (90%) report having had their eyes examined by an ECP compared with adults who report never completing high school (73%).^c

KAP Comparison

1991: 96% of adults say that an ECP examined their eyes.

2005: 86% of adults say that an ECP examined their eyes.

Seventy-four percent of adults have had their eyes examined within the past two years.

Among the 91% of adults who report having had their eyes examined by some type of HCP, 57% had their eyes examined in the past year. An additional 17% say they had had their eyes examined within the past two years. Thus, nearly three-quarters (74%) reportedly had their eyes examined within the past two years. Nine percent (9%) of adults report never having had their eyes examined.

More women (79%) report having had their last eye examination within the past two years compared with men (69%).^c More adults aged 65 and older (86%) report having had their eyes examined within the past two years compared with adults aged 40 to 64 (78%) and adults aged 18 to 39 (65%).^c Asians (81%) and Hispanics (80%) more often report having had eye examinations within the past two years than Caucasians (74%) and Blacks (69%).^b Seventy-eight percent (78%) of adults with a college degree or higher education report having had eye examinations within the past two years compared with 77% of those having attended some college, 73% of those having attained a high school diploma, and 65% of those with less than a high school education.^c

KAP Comparison

1991: 65% of adults report that they had had an eye exam by an ECP in the past two years. More women (70%) than men (58%) reportedly had an eye exam in the past two years.

2005: 74% of adults report that they had had an eye exam by an ECP in the past two years. More women (79%) than men (69%) report having had an eye exam in the past two years.

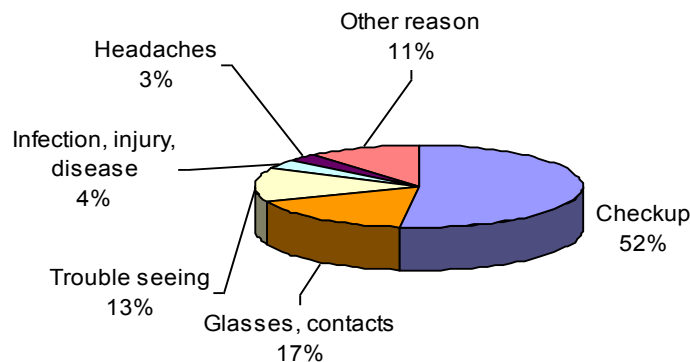
^b p<.01

Fifty-two percent of adults who report having had their eyes examined did so for a regular checkup.

Among the 91% of adults who report having had their eyes examined by an HCP, 52% report that the main reason they had their eyes examined was for a regular checkup (see Figure 4-2). Other responses to the main reason for having had an eye examination by an ECP include: needed new glasses or contact lenses (17%); had trouble seeing (13%); had an eye infection, injury, or eye disease (4%); and had headaches (3%).

Figure 4-2

Main Reason for Having Had an Eye Exam by an Eye Care Provider



Adults aged 65 and older (58%) more often report that the main reason they had their eyes examined was for a regular checkup than adults aged 18 to 39 (50%) and those aged 40 to 64 (51%).^c Adults aged 40 to 64 (16%) more frequently report having had their eyes examined because they had trouble seeing compared with adults aged 18 to 39 (9%) and those aged 65 and older (13%).^c

"Not having any problems and not feeling the need" is the main reason for adults never having had an eye exam by an ECP.

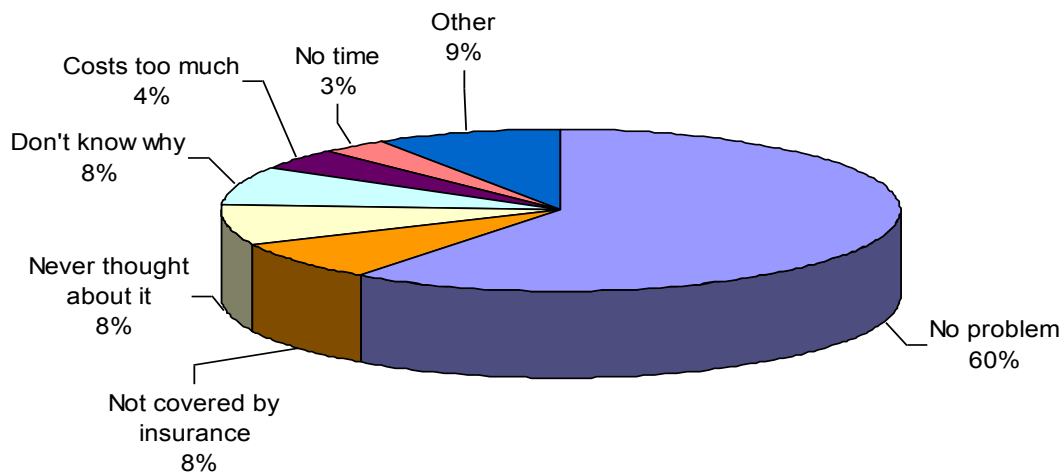
Nine percent (9%) of adults report never having had their eyes examined by an HCP. Among this segment of adults, 60% report that the main reason for never having had an eye examination is because they did not have any problems and did not feel the need for an eye exam (see Figure 4-3). When looked at by age groups, more adults aged 18 to 39 (63%) and adults aged 40 to 64 (61%) report

that they never had an eye exam because they have not had any problems and have not felt the need compared with adults aged 65 and older (38%).^c

Other responses to the main reason for never having had an eye examination by an ECP include: never thought about having their eyes examined (8%), unsure why they had not had their eyes examined (8%), an eye exam was not covered by insurance (8%), thought that the exam costs too much (4%), and had no time or never got around to it (3%).

Figure 4-3

Main Reason For Never Having Had an Eye Exam by an Eye Care Provider



More adults aged 18 to 39 (63%) and adults aged 40 to 64 (61%) report not having any problems and therefore have no need to see an ECP for an eye exam compared to adults 65 years and older (38%).^c In terms of gender differences, 66% of men and 49% of women report that they never had an eye exam because they have not had any problems and have not felt the need.

Virtually all adults are likely to seek eye care if encouraged by their PCP and/or family members.

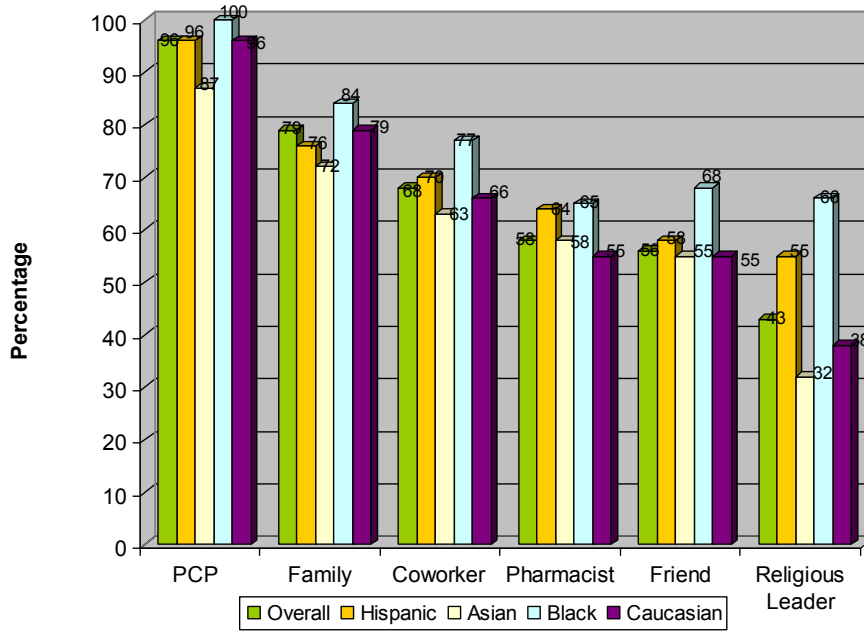
Almost all adults (96%) say they would be somewhat or very likely⁸ to have their eyes examined if their PCP suggested they do so, 79% say they would do so if a

⁸ Survey respondents rated likelihood on a 4-point scale—Very likely, Somewhat likely, Not likely at all, Don't know/Depends—of seeking eye care if encouraged to do so by various people.

member(s) of their family suggested it, 68% say they would seek eye care if a coworker/employer suggested it, 58% say they would do so if their pharmacist suggested it, 56% say they would do so if their friends suggested it, and 43% say they would seek eye care if the suggestion came from a religious leader (see Figure 4-4).

Figure 4-4

Percentage of Adults Who Would Be at Least Somewhat Likely To Get Their Eyes Examined By Recommending Party



Primary care providers

More Blacks (100%), Hispanics (96%), and Caucasians (96%) report that they would be somewhat or very likely to get their eyes examined if their PCP suggested they do so compared with Asians (87%) (see Table 4-5).^c

Table 4-5: Percentage Reporting that They Would Be Somewhat or Very Likely to Get Their Eyes Examined if Their Primary Care Provider Told Them to Do So

Race	Very Likely	Somewhat Likely
Hispanic	66%	30%
Asian	74%	13%
Black	91%	9%
Caucasian	82%	14%

* The race/ethnicity categories are mutually exclusive.

More women (97%) than men (95%) report being influenced by their PCP to seek eye care.^c

Family members

More Blacks (84%) report being somewhat or very likely to get their eyes examined if a member(s) of their family suggested they do so compared with Caucasians (79%), Hispanics (76%), and Asians (72%) (see Table 4-6).^b

Table 4-6: Percentage Reporting that They Would Be Somewhat or Very Likely to Get Their Eyes Examined if a Family Member Told Them to Do So

Race	Very Likely	Somewhat Likely
Hispanic	30%	46%
Asian	27%	45%
Black	47%	37%
Caucasian	34%	45%

* The race/ethnicity categories are mutually exclusive.

Younger adults (84%) more often report they would get their eyes examined if a member(s) of their family suggested they do so compared with adults aged 40 to 64 (78%) and adults aged 65 and older (67%).^c

Coworkers/employers

Blacks (77%) and Hispanics (70%) more often report being somewhat or very likely to get their eyes examined if a coworker or employer suggested they do so than Caucasians (66%) and Asians (63%) (see Table 4-7).^b

Table 4-7: Percentage Reporting that They Would Be Somewhat or Very Likely to Get Their Eyes Examined if a Coworker/Employer Told Them to Do So

Race	Very Likely	Somewhat Likely
Hispanic	20%	50%
Asian	24%	39%
Black	42%	35%
Caucasian	25%	41%

* The race/ethnicity categories are mutually exclusive.

More adults aged 18 to 39 (74%) report being somewhat or very likely to get their eyes examined if a coworker or employer suggested they do so than adults aged 40 to 64 (69%) and adults aged 65 and older (51%).^c

Pharmacists

More Blacks (65%) and Hispanics (64%) than Asians (58%) and Caucasians (55%) report being somewhat or very likely to get their eyes examined if a pharmacist suggested they do so (see Table 4-8).^c

Table 4-8: Percentage Reporting that They Would Be Somewhat or Very Likely to Get Their Eyes Examined if a Pharmacist Told Them to Do So

Race	Very Likely	Somewhat Likely
Hispanic	19%	45%
Asian	29%	29%
Black	36%	29%
Caucasian	22%	33%

* The race/ethnicity categories are mutually exclusive.

Adults aged 18 to 39 (63%) more often report being somewhat or very likely to get their eyes examined if a pharmacist suggested they do so compared with adults aged 40 to 64 (58%) and adults aged 65 or older (46%).^c

Friends

Blacks (68%) more often report being somewhat or very likely to get their eyes examined if a friend suggested they do so than Hispanics (58%), Caucasians (55%), and Asians (55%) (see Table 4-9).^b

Table 4-9: Percentage Reporting that They Would Be Somewhat or Very Likely to Get Their Eyes Examined if a Friend Told Them to Do So

Race	Very Likely	Somewhat Likely
Hispanic	13%	45%
Asian	18%	37%
Black	30%	38%
Caucasian	14%	41%

* The race/ethnicity categories are mutually exclusive.

Adults aged 18 to 39 (61%) more often report being somewhat or very likely to get their eyes examined if a friend suggested they do so than adults aged 40 to 64 (56%) and adults aged 65 and older (44%).^c More women (59%) than men (53%) report being influenced by their friends to seek eye care.^c

Religious leaders

More Blacks (66%) and Hispanics (55%) say they would be somewhat or very likely to seek eye care if encouraged by their religious leader compared with Caucasians (38%) and Asians (32%) (see Table 4-10).^c

Table 4-10: Percentage Reporting that They Would Be Somewhat or Very Likely to Get Their Eyes Examined if Their Religious Leader Told Them to Do So

Race	Very Likely	Somewhat Likely
Hispanic	14%	41%
Asian	9%	23%
Black	29%	37%
Caucasian	11%	27%

* The race/ethnicity categories are mutually exclusive.

Adults aged 18 to 39 (47%) and adults aged 40 to 64 (43%) are more likely than adults aged 65 and older (31%) to report being somewhat or very likely to get their eyes examined if a religious leader suggested they do so.^c Fifty-five percent (55%) of adults with an annual household income below \$15,000, 42% with household incomes of \$15,000 to \$34,999, 39% with household incomes of \$35,000 to \$74,999, and 42% with household incomes of \$75,000 or more report being willing to seek eye care if recommended to do so by a religious leader.

CHAPTER 5: KNOWLEDGE ABOUT EYE DISEASE

This chapter presents results from the 2005 KAP Study for four eye diseases and conditions: glaucoma, age-related macular degeneration (AMD), diabetic eye disease, and low vision.

Glaucoma

Ninety percent of adults have heard of glaucoma.

Ninety percent (90%) of adults report that they have heard of glaucoma. More Blacks (95%) and Caucasians (95%) report having heard of glaucoma than Asians (74%) and Hispanics (66%).^c More adults aged 40 to 64 (94%) and adults aged 65 and older (96%) report having heard of glaucoma compared with adults aged 18 to 39 (85%).^c Insured adults (93%) more often report having heard of glaucoma than uninsured adults (79%).^c Adults with higher annual household incomes more often report having heard of glaucoma (87% of those with household incomes \$15,000 to \$34,999, 96% of those with household incomes of \$35,000 to \$74,999, and 94% of those with household incomes of \$75,000 or more) compared with adults with household incomes below \$15,000 (83%).^c More adults with a higher education report having heard of glaucoma (90% of those with a high school diploma, 94% of those with some college education, and 95% of those with a college degree or more education) compared with those with less than a high school diploma (81%).^c

KAP Comparison

1991: 91% of adults report having heard of glaucoma.

2005: 90% of adults report having heard of glaucoma.

Many adults who have heard of glaucoma know that it can cause vision loss, can be treated, and can be prevented; however, very few adults know that there are no early warning symptoms.

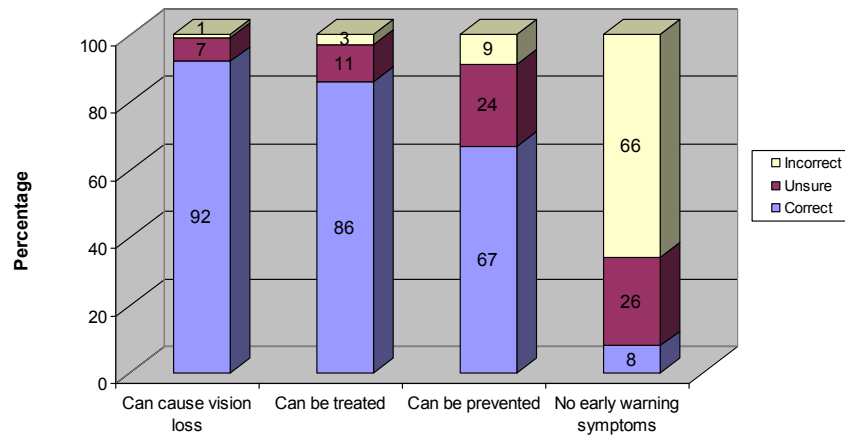
Among the 90% of adults who report having heard of glaucoma, 92% know that glaucoma can cause vision loss, 86% know that glaucoma can be treated, and 67% know that vision loss from glaucoma can be prevented (see Figure 5-1).

^c p<.001

However, only 8% know that there are no early warning symptoms for glaucoma.⁹

Figure 5-1

Percentage of Correct, Unsure, and Incorrect Responses to Four Questions About Glaucoma



Note: Percentages may not add to 100 percent due to rounding.

Glaucoma can cause vision loss.

Ninety-eight percent (98%) of Blacks, 92% of Caucasians, 91% of Asians, and 85% of Hispanics report knowing that glaucoma can cause vision loss.^c Most adults with health insurance (93%) and those without health insurance (89%) correctly identify that glaucoma can cause vision loss. A majority of those with household incomes of \$75,000 or more (95%), \$35,000 to \$74,999 (93%), \$15,000 to \$34,999 (90%), and adults with household incomes under \$15,000 (90%)^a report knowing that glaucoma can cause vision loss.

Glaucoma can be treated to prevent vision loss.

Blacks (92%), more than Asians (88%), Caucasians (86%), and Hispanics (81%), report knowing that glaucoma can be treated to prevent vision loss.^c Older adults more often report knowing that glaucoma can be treated (89% of adults aged 40 to 64, and 88% of adults aged 65 or older) compared with 82% of adults aged 18 to 39.^c Adults with annual household incomes at or above \$15,000 more

⁹ Reported knowledge about glaucoma is based on respondents' answers of *True*, *False*, or *Not Sure* to specific statements.

^a p<.05

often report knowing that glaucoma can be treated (86% of those with household incomes of \$15,000 to \$34,999, 87% of those with household incomes of \$35,000 to \$74,999, and 88% of those with household incomes of \$75,000 or more) compared with 81% among those with household incomes below \$15,000.^a Adults with higher levels of education (86% of those with a high school diploma, 86% of those with some college education, 89% of those with a college degree or more education) more often report knowing that glaucoma is treatable compared with those with less than a high school diploma (81%).^b

Vision loss from glaucoma can be prevented.

More adults aged 40 to 64 years (72%) correctly identify that vision loss from glaucoma can be prevented compared with adults aged 18 to 39 (64%) and adults aged 65 and older (60%).^c Adults with higher annual household incomes (70% of those with household incomes of \$35,000 to \$74,999; 73% of those with household incomes of \$75,000 or more) more often report knowing that vision loss from glaucoma can be prevented compared with 59% of those with household incomes less than \$15,000 and 65% of those with household incomes of \$15,000 to \$34,999.^c Adults with at least some college education (70% of those with some college education, and 75% of those with a college degree or more education) more frequently report knowing that vision loss from glaucoma can be prevented compared with those with less education (60% of those with less than a high school diploma, and 60% of those with a high school diploma).^c

Glaucoma has no early warning symptoms.

Adults aged 40 to 64 (11%) and adults aged 65 and older (10%) more often correctly answer a true-or-false statement that glaucoma has no early warning symptoms than adults aged 18 to 39 (4%).^c Ten percent (10%) of women and 6% of men correctly identify that there are no early warning symptoms for glaucoma.

Age-Related Macular Degeneration (AMD)

Fifty-two percent of adults report having heard of AMD.

Among adults, 52% report that they heard of AMD (59% of women and 44% of men).^c More Caucasians (58%) report having heard of AMD than Blacks (34%), Asians (33%), and Hispanics (32%).^c Older adults (70% of those aged 65 or older) more often report having heard of AMD than younger adults (39% of those aged

^b p<.01

18 to 39 and 58% of those aged 40 to 64).^c Insured adults (56%) report having heard of AMD more frequently than uninsured adults (36%).^c Adults with higher annual household incomes more often report having heard of AMD (48% of those with household incomes of \$15,000 to \$34,999, 56% of those with household incomes of \$35,000 to \$74,999, and 60% of those with household incomes of \$75,000 or more) compared with those with household incomes below \$15,000 (36%).^c Adults with higher levels of education (48% of those with a high school diploma, 59% of those with some college education, 65% of those with a college degree or more education) more often report having heard of AMD than those with less education (32% of those with less than a high school diploma).^c

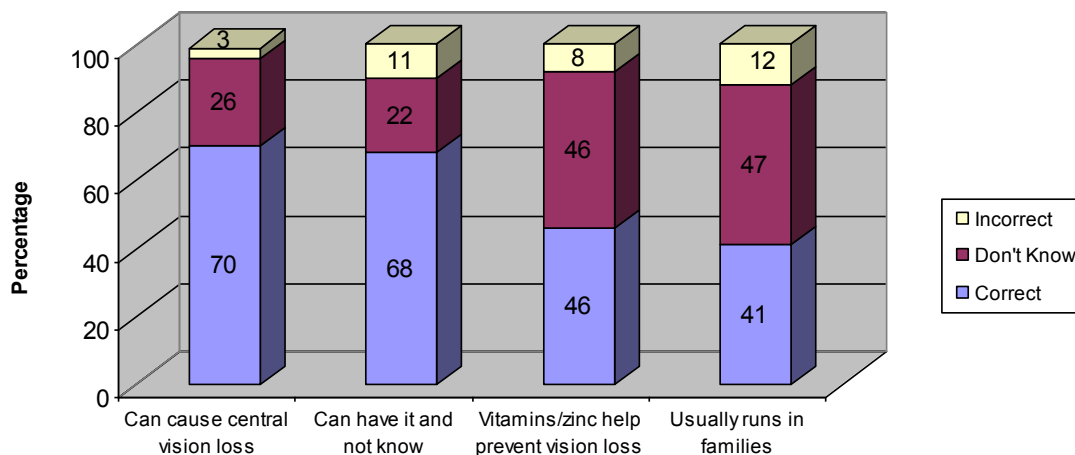
Many adults who have heard of AMD know that AMD can cause central vision loss, and that someone can have AMD and not know it. However, fewer adults know that vitamins and zinc can help prevent vision loss and that AMD usually runs in families.

Among the 52% of adults who report having heard of AMD, 70% are aware that AMD can cause central vision loss, 68% know that someone can have AMD and not know it, 46% know that vitamins and zinc can help prevent vision loss in some people, and 41% know that AMD usually runs in families (see Figure 5-2).¹⁰

¹⁰ Reported knowledge about AMD is based on respondents' answers of *True*, *False*, or *Not Sure* to specific statements.

Figure 5-2

Percentage of Correct, Unsure, and Incorrect Responses to Four Questions About AMD



Note: Percentages may not add to 100 percent due to rounding.

AMD can cause central vision loss.

Seventy-two percent (72%) of Blacks, 71% of Asians, 71% of Caucasians, and 63% of Hispanics who had heard of AMD know that AMD can cause central vision loss.

Someone can have AMD and not know it.

More men (74%) than women (63%) report knowing that someone can have AMD and not know it.^c Adults aged 18 to 39 (71%) and those aged 40 to 64 (71%) more often correctly identify that someone can have AMD and not know it compared with adults aged 65 and older (57%).^c Those without any kind of health insurance coverage (74%) more often report that someone can have AMD and not know it than those who report having insurance coverage (67%).^a

Vitamins and zinc help prevent vision loss.

Among adults, more Asians (53%) than Caucasians (48%), Hispanics (47%), and Blacks (33%) who had heard about AMD know that vitamins and zinc help prevent vision loss from AMD in some people.^a More adults aged 18 to 39 (53%) correctly identify that vitamins and zinc help prevent vision loss compared with adults aged 40 to 64 (44%) and adults aged 65 and older (40%).^c Adults with a

^a p<.05

lower annual household income (50% of those with household incomes less than \$15,000 and 53% of those with household incomes of \$15,000 to \$34,999) more often identify that vitamins and zinc help prevent vision loss compared with those with higher household incomes (44% with household incomes of \$35,000 to \$74,999 and 42% with household incomes of \$75,000 or more).^a

AMD usually runs in families.

Fifty-two percent (52%) of Hispanic, 45% of Black, 42% of Caucasian, and 34% of Asian adults who had heard about AMD know that AMD usually runs in families.^a Adults aged 18 to 39 (47%) correctly identify more often than adults aged 40 to 64 (42%) and adults aged 65 and older (32%) that AMD usually runs in families.^c Forty-nine percent (49%) of adults with less than a high school education, 42% of those with a high school diploma, 38% of those with some college education, and 41% of those with a college degree or more education indicate correctly that AMD usually runs in families.

Diabetic Eye Disease

Fifty-one percent of adults report having heard of diabetic eye disease, such as diabetic retinopathy.

Among the 51% of adults that report having heard of diabetic eye disease, such as diabetic retinopathy, more women (58%) than men (43%) report having heard of diabetic eye disease. Fifty-three percent (53%) of Caucasian, 47% of Black, 46% of Asian, and 43% of Hispanic adults report having heard of diabetic eye disease.^c Adults aged 65 and older (65%) and adults aged 40 to 64 (59%) more often report having heard of diabetic eye disease than adults aged 18 to 39 (37%).^c Insured adults (54%) more often report having heard of diabetic eye disease than uninsured adults (38%).^c

Adults with an annual household income above \$15,000 more often report having heard of diabetic eye disease (50% of those with household incomes of \$15,000 to \$34,999, 52% of those with household incomes of \$35,000 to \$74,999, and 54% of those with household incomes of \$75,000 or more) compared with those with household incomes less than \$15,000 (45%).^a Lastly, adults with higher levels of education report having heard of diabetic eye disease more often than those who never completed high school.^c

KAP Comparison

1991: 39% of adults report having heard of diabetic eye disease.

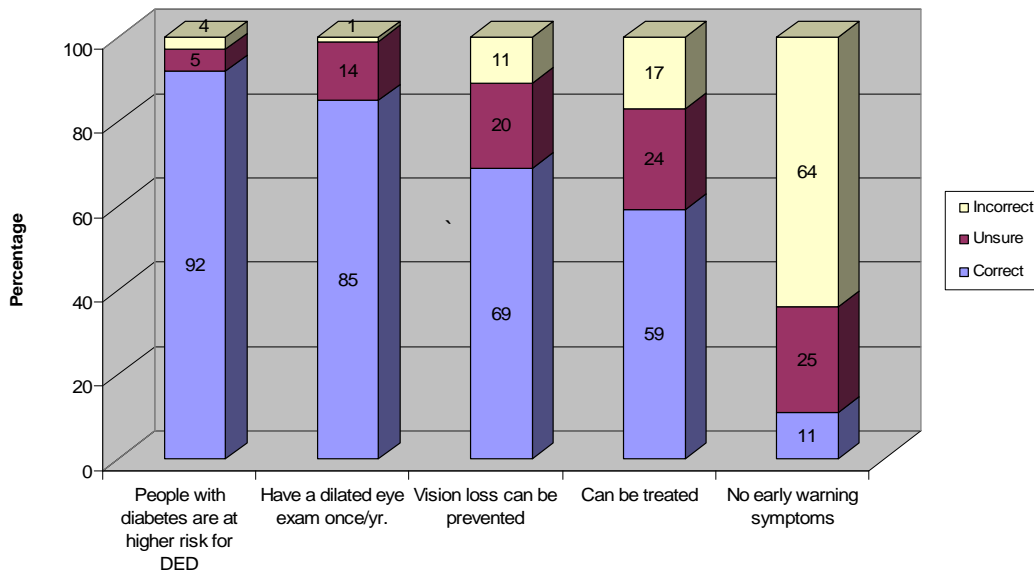
2005: 51% of adults report having heard of diabetic eye disease, such as diabetic retinopathy.

Many adults who know about diabetic eye disease know that people with diabetes are at higher risk for eye disease, that people with diabetes should have a dilated eye examination at least once a year, that vision loss caused by diabetes can be prevented, and that vision loss caused by diabetes can be treated. However, most adults are uninformed that there are no early warning symptoms.

Among the 51% of adults who report having heard of diabetic eye disease, 92% know that people with diabetes are at higher risk for eye disease (see Figure 5-3). Eighty-five percent (85%) of adults correctly identify that people with diabetes should have a dilated eye examination at least once a year. Sixty-nine percent (69%) know that vision loss caused by diabetes can be prevented. Fifty-nine percent (59%) know that vision loss caused by diabetes can be treated. However, only 11% know that diabetic eye disease usually has no early warning symptoms.¹¹

Figure 5-3

Percentage of Correct, Unsure, and Incorrect Responses to Five Questions About Diabetic Eye Disease



Note: Percentages may not add to 100 percent due to rounding.

¹¹ Reported knowledge about diabetic eye disease is based on respondents' answers of *True*, *False*, or *Not Sure* to specific statements.

People with diabetes are at higher risk for diabetic eye disease than people without diabetes.

Ninety-seven percent (97%) of Asian, 92% of Black, 92% of Caucasian, and 87% of Hispanic adults report knowing that people with diabetes are at higher risk for diabetic eye disease than people without diabetes.^a Adults aged 40 to 64 (93%) more frequently indicate that people with diabetes are at higher risk for diabetic eye disease than adults aged 18 to 39 (89%) and adults aged 65 and older (91%).^c Adults with annual household incomes above \$15,000 more often correctly identify that people with diabetes are at higher risk for diabetic eye disease (89% of those with household incomes of \$15,000 to \$34,999, 93% of those with household incomes of \$35,000 to \$74,999, and 96% of those with household incomes of \$75,000 or more) compared with those with household incomes below \$15,000 (84%).^c

In terms of education, those with a high school diploma (92%), those with some college education (92%), and those with a college degree or more education (95%) more frequently indicate that people with diabetes are at higher risk for diabetic eye disease compared with adults with less than a high school education (83%).^c

People with diabetes should have a dilated eye exam at least once a year.

More women (90%) than men (79%) report knowing that people with diabetes should have a dilated eye exam at least once a year.^c Ninety-three percent (93%) of Blacks, 87% of Hispanics, 84% of Caucasians, and 82% of Asians correctly report knowing that people with diabetes should have a dilated eye exam at least once a year.^a

Vision loss caused by diabetes can be prevented.

More men (72%) than women (66%) are aware that vision loss caused by diabetes can be prevented.^a Adults aged 18 to 39 (72%) and adults aged 40 to 64 (72%) more frequently indicate that vision loss caused by diabetes can be prevented compared with adults aged 65 and older (58%).^c Adults with some college education (73%) and those with a college degree or more education (71%) more often indicate that vision loss caused by diabetes can be prevented compared with those with less than a high school education (64%) and a high school diploma (63%).^c

Eye disease caused by diabetes can be treated.

Blacks (68%) and Caucasians (60%) more often report that eye disease caused by diabetes can be treated than Hispanics (47%) and Asians (41%).^c Adults with an annual household income of \$15,000 to \$34,999 (59%), \$35,000 to \$74,999 (62%), and \$75,000 or more (60%) more frequently indicate that eye disease caused by diabetes can be treated compared with those with household incomes below \$15,000 (52%).^a Fifty-eight percent (58%) of adults aged 40 to 64, 59% of adults aged 65 and older, and 60% of adults aged 18 to 39 correctly identify that eye disease caused by diabetes can be treated. Adults with a college degree or more education more frequently answer correctly that eye disease caused by diabetes can be treated compared with those with less education.

Eye disease caused by diabetes usually has no early warning symptoms.

More Caucasians (12%) are aware that eye disease caused by diabetes usually has no early warning symptoms compared with Asians (10%), Blacks (9%), and Hispanics (6%).^b More adults aged 40 to 64 (14%) report that eye disease caused by diabetes usually has no early warning symptoms compared with adults aged 18 to 39 (9%) and adults aged 65 and older (8%).^c Thirteen percent (13%) of women and 9% of men are aware that eye disease caused by diabetes usually has no early warning symptoms. Thirteen percent (13%) of adults with annual household incomes of \$15,000 to \$34,999, 12% of adults with household incomes of \$35,000 to \$74,999, 11% of adults with household incomes of \$75,000 or more, and 7% of adults with household incomes below \$15,000 report that eye disease caused by diabetes usually has no early warning symptoms. Thirteen percent (13%) of adults with less than a high school education, 12% of those with a high school diploma, 11% of those with some college education, and 11% of those with a college degree or more education are aware that eye disease caused by diabetes usually has no early warning symptoms.

Low Vision

Sixteen percent of adults report ever having heard the term “low vision.”

“Low vision” is defined as a visual impairment that is not corrected by standard eyeglasses, contact lenses, medication, or surgery and that interferes with the ability to perform everyday activities. Sixteen percent (16%) of adults report having heard of the term low vision. Blacks (27%) more often report having heard of low vision compared with 23% of Hispanics, 14% of Caucasians, and 10% of Asians.^c Adults with an annual household income below \$15,000 (21%)

more frequently report having heard the term low vision compared with those with household incomes of \$15,000 to \$34,999 (16%), \$35,000 to \$74,999 (14%), and \$75,000 or more (14%).^b

Very few adults report being told by an eye care provider (ECP) that they have low vision or being recommended to see a low vision specialist.

Two percent (2%) of adults (approximately 4.8 million) have been told by an ECP that they have low vision. Among adults reporting this, 31% (approximately 1.5 million) report that their ECP recommended they see a low vision specialist. Of these adults, 88% (approximately 1.2 million) say they actually saw a low vision specialist.

Ten percent of adults report using a visual device for low vision, such as a magnifier or telescope.

Ten percent (10%) of all adults report using any type of visual device for low vision, such as a magnifier or telescope. Those with health insurance (11%) more frequently report using any type of visual device for low vision than those without health insurance (4%).^c Adults with an annual household income below \$15,000 (12%) and those with a household income of \$15,000 to \$34,999 (11%) more frequently report using a visual device for low vision compared with those with a household income of \$35,000 to \$74,999 (8%) and \$75,000 or more (5%).^c

Among the 10% of adults (approximately 13.1 million) who have fair or poor vision and use eyewear, 31% report using a visual device for low vision. Among adults who have fair or poor vision and do not use eyewear, 17% report using a visual device for low vision.

Of the 10% of all adults who report using any type of visual device, 17% report receiving instruction on how to use it. Fifty-five percent (55%) report that the device is very important or somewhat important, 34% report that the device is not that important, and 11% report that the device is not at all important to their day-to-day activities.

As shown in Table 5-1, among the 10% of adults who report using assistive devices, such as large-print materials, talking books, and guide dogs, most report using large-print materials (7%) because of problems with their vision.

Table 5-1: Types of Assistive Devices Used

Type of Device	Percentage
Large-print materials	7%
Other (e.g., magnifying mirrors, binoculars, pen lights)	4%
Computer adapted with large-print screen or voice output	2%
Other talking items (e.g., clocks, watches, calculators)	2%
White cane	1%
Talking books	1%
Guide dog	<1%

Of those reporting using large-print materials, more adults aged 65 and older (14%) report using such assistance compared with adults aged 40 to 64 (8%) and adults aged 18 to 39 (3%).^c Of those who report using an assistive device, 74% report that the devices are very important or somewhat important to their day-to-day activities. More women (83%) than men (65%) report that assistive devices are very important or somewhat important to their day-to-day activities.^c

CHAPTER 6: INFORMATION SOURCES

This chapter presents results from the 2005 KAP Study about places where adults have seen or heard something about eye health or disease and people whom adults may have talked with about eye health or disease.

When asked where they had seen or heard something about eye health or disease during the past 12 months, more adults report television programs or commercials; a doctor's office, clinic, or community health screening; and magazines or newsletters.

For this particular survey item, the interviewer did not read a series of choices; rather, if the respondent answered the question, he or she was probed, "Where else have you seen or heard something about eye health or eye disease?" Respondents had an opportunity to provide up to 11 responses. The reported figures are calculated by using the first response provided by survey respondents and then generating frequencies and cross-tabulations.

Over the past 12 months, 24% of adults report having seen or heard something about eye health or disease on television; 17% report having seen or heard something about eye health or disease in the doctor's office, clinic, or community health screening; 11% report having seen something in magazines or newsletters; and 21% report that they had not seen or heard anything about eye health or disease (see Table 6-1).

Table 6-1: Places Where Adults Hear or See Reports About Eye Health or Disease*

Location	Percentage
TV/commercial	24%
Doctor's office	17%
Magazine/newsletter	11%
Relative/friend	4%
Workplace	3%
Newspaper	2%
Radio	2%
Educational pamphlet	2%
Online	1%
Religious or social organization	<1%
Drug store or supermarket	<1%
Health information hotline	<1%
Haven't heard anything	21%

* This question was asked several times. The reported percentages reflect the first response to this question.

Race/Ethnicity

In the previous 12 months, more Blacks (26%), Caucasians (24%), and Hispanics (25%) report having seen or heard something about eye health or disease on television programs or commercials than Asians (8%) (see Table 6-2). Seventeen percent (17%) of Caucasians, 16% of Asians, 16% of Blacks, and 13% of Hispanics report having seen or heard something about eye health or disease in a doctor's office, clinic, or community health screening in the past 12 months.^a More Asians (12%) and Caucasians (12%) report having seen something about eye health or disease in a magazine or newsletter than Blacks (7%) and Hispanics (6%).^a More Hispanics (41%) report that they have not seen or heard anything about eye health or disease in the past 12 months compared with Asians (28%), Blacks (26%), and Caucasians (16%).^c

Table 6-2: Places Where Adults Hear or See Reports About Eye Health or Disease, by Race/Ethnicity

Source	Overall	Hispanic	Asian	Black	Caucasian
TV/commercial	24%	25%	8%	26%	24%
Doctor's office	17%	13%	16%	16%	17%
Magazine/newsletter	11%	6%	12%	7%	12%
Haven't heard anything	21%	41%	28%	26%	16%

* The race/ethnicity categories are mutually exclusive.

Age

In the previous 12 months, 25% of adults aged 40 to 64, 23% of adults aged 18 to 39, and 20% of adults aged 65 and older indicate that they have seen or heard something about eye health or disease on television programs or commercials (see Table 6-3). Adults aged 65 and older (20%) and adults aged 40 to 64 (17%) more often report having heard or seen something about eye health or disease in a doctor's office, clinic, or community health screening than adults aged 18 to 39 (15%).^c More adults aged 65 and older (14%) and adults aged 40 to 64 (13%) report having read something about eye health or disease in a magazine or newsletter compared with adults aged 18 to 39 (8%).^c Twenty-three percent (23%) of adults aged 65 and older, 22% of adults aged 18 to 39, and 19% of adults aged 40 to 64 report never having heard or seen anything about eye health or disease.

^a p<.05

^c p<.001

Table 6-3: Places Where Adults Hear or See Reports About Eye Health or Disease, by Age

Source	Overall	18-39	40-64	65 +
TV/commercial	24%	23%	25%	20%
Doctor's office	17%	15%	17%	20%
Magazine/newsletter	11%	8%	13%	14%
Haven't heard anything	21%	22%	19%	23%

Annual Household Income

In the previous 12 months, 26% of adults with annual household incomes between \$15,000 and \$34,999, 23% of those with household incomes of \$35,000 to \$74,999, 23% of those with household incomes of \$75,000 or more, and 21% of those with household incomes of less than \$15,000 report having seen or heard something about eye health or disease on television programs or commercials (see Table 6-4). Nineteen percent (19%) of adults with household incomes between \$15,000 and \$34,999, 18% of those with household incomes of \$75,000 or more, 15% of those with household incomes below \$15,000, and 15% of those with household incomes of \$35,000 to \$74,999 report having heard or seen something about eye health or disease in a doctor's office, clinic, or community health screening. Adults with a household income of \$75,000 or more (16%) and those with household incomes of \$35,000 to \$74,999 (12%) more often report having read something about eye health or disease in a magazine or newsletter compared with those with household incomes of \$15,000 to \$34,999 (8%) and household incomes below \$15,000 (7%).^c More adults with a household income below \$15,000 (34%) report that they have never seen or heard anything about eye health or disease in the past 12 months compared with those with household incomes of \$15,000 to \$34,999 (22%), \$35,000 to \$74,999 (19%), and \$75,000 or more (11%).^c

Table 6-4: Places Where Adults Hear or See Reports About Eye Health or Disease, by Income

Source	Overall	<\$14,999	\$15,000 to \$34,999	\$35,000 to \$74,999	\$75,000 +
TV/commercial	24%	21%	26%	23%	23%
Doctor's office	17%	15%	19%	15%	18%
Magazine/newsletter	11%	7%	8%	12%	16%
Haven't heard anything	21%	34%	22%	19%	11%

Education

In the past 12 months, 26% of adults with a high school diploma, 24% of those with some college education, 23% of those with less than a high school education, and 20% of those with a college degree or more education report

having seen or heard something about eye health or disease on television programs or commercials (see Table 6-5). Eighteen percent (18%) of adults with a college degree or more education, 18% of those with a high school diploma, 16% of those with some college education, and 14% of those with less than a high school education report having heard or seen something about eye health or disease in a doctor’s office, clinic, or community health screening. More adults with a college degree or more education (16%) and some college education (12%) report having read something about eye health or disease in a magazine or newsletter compared with those with less than a high school education (8%) and those with a high school diploma (8%).^c More adults with less than a high school education (32%) report that they have never seen or heard anything about eye health or disease compared with those with a high school diploma (23%), some college education (17%), and those with a college degree or more education (14%).^c

Table 6-5: Places Where Adults Hear or See Reports About Eye Health or Disease, by Education

Source	Overall	<HS	HS diploma	Some college	College degree +
TV/commercial	24%	23%	26%	24%	20%
Doctor’s office	17%	14%	18%	16%	18%
Magazine/newsletter	11%	8%	8%	12%	16%
Haven’t heard anything	21%	32%	23%	17%	14%

Gender

Twenty-five percent (25%) of men and 22% of women indicate that they have seen or heard something about eye health or disease on television programs or commercials in the previous 12 months (see Table 6-6). Women (19%) more often report having heard or seen something about eye health or disease in a doctor’s office, clinic, or community health screening than men (14%).^c More women (12%) report having read something about eye health or disease in a magazine or newsletter compared with men (9%).^c Twenty-two percent (22%) of men and 20% of women report never hearing or seeing anything about eye health or disease.

Table 6-6: Places Where Adults Hear or See Reports About Eye Health or Disease, by Gender

Source	Overall	Male	Female
TV/commercial	24%	25%	22%
Doctor’s office	17%	14%	19%
Magazine/newsletter	11%	9%	12%
Haven’t heard anything	21%	22%	20%

In the past 12 months, more adults talked to a relative, friend, or an eye care provider (ECP) about eye health or eye disease.

Over the previous 12 months, 42% of adults report talking with a relative or friend about eye health or disease, and 41% of adults report talking with an ECP (see Table 6-7). Sixteen percent (16%) report talking with a health care provider (HCP) who is not an ECP, and 15% report having talked with a coworker or employer. Three percent (3%) say they talked about eye health or disease with anyone else, and 2% say they spoke with a pharmacist.

Table 6-7: Percentage of Adults Who Report Speaking to Anyone in the Past 12 Months About Eye Health or Disease

Location	Percentage
Relative or friend	42%
Eye care provider	41%
Health care provider	16%
Coworker(s) or employer	15%
Anyone else	3%
Pharmacist	2%

* Percentages will not total to 100% due to individual respondents providing multiple answers.

Race/Ethnicity

In the past 12 months, Caucasians (45%) and Blacks (41%) more often report talking about eye health or disease with a relative or friend than Asians (35%) and Hispanics (33%) (see Table 6-8).^c Caucasians (44%) and Asians (43%) more often report talking about eye health or disease with an ECP than Blacks (37%) and Hispanics (29%).^c More Blacks (22%) report talking with an HCP about eye health or disease than Caucasians (15%), Asians (14%), and Hispanics (13%) in the past 12 months.^c More Blacks (16%) and Caucasians (16%) report talking with coworkers or employers about eye health or disease than Asians (14%) and Hispanics (10%).^b

Table 6-8: Whom People Talk to About Eye Health or Disease, by Race/Ethnicity

Source	Overall	Hispanic	Asian	Black	Caucasian
Relative or friend	42%	33%	35%	41%	45%
Eye care provider	42%	29%	43%	37%	44%
Health care provider	15%	13%	14%	22%	15%
Coworker(s) or employer	15%	10%	14%	16%	16%

* The race/ethnicity categories are mutually exclusive.

^b p<.01

Age

In the previous 12 months, more adults aged 40 to 64 (45%) report talking about eye health or disease with a relative or friend compared with adults aged 18 to 39 (40%) and adults aged 65 and older (39%) (see Table 6-9).^a More adults aged 65 and older (58%) report talking about eye health or disease with an ECP compared with adults aged 18 to 39 (30%) and adults aged 40 to 64 (46%).^c Adults aged 40 to 64 (18%) and adults aged 65 and older (17%) more frequently report talking with an HCP about eye health or disease compared with adults aged 18 to 39 (12%).^c Adults aged 40 to 64 (19%) and adults aged 18 to 39 (14%) more frequently indicate talking about eye health or disease with coworkers or employers compared with adults aged 65 and older (5%).^c

Table 6-9: Whom People Talk to About Eye Health or Disease, by Age

Source	Overall	18-39	40-64	65 +
Relative or friend	42%	40%	45%	39%
Eye care provider	41%	30%	46%	58%
Health care provider	16%	12%	18%	17%
Coworker(s) or employer	15%	14%	19%	5%

Annual Household Income

In the previous 12 months, adults with an annual household income of \$75,000 or more (48%), \$35,000 to \$74,999 (44%), and \$15,000 to \$34,999 (43%) more frequently report talking about eye health or disease with a relative or friend compared with those with household incomes below \$15,000 (36%) (see Table 6-10).^c More adults with household incomes of \$75,000 or more (50%), \$35,000 to \$74,999 (43%), and \$15,000 to \$34,999 (40%) report talking about eye health or disease with an ECP compared with those with household incomes below \$15,000 (31%).^c Eighteen percent (18%) of adults with household incomes of \$75,000 or more, 16% with household incomes of \$15,000 to \$34,999, 14% with household incomes below \$15,000, and 14% with household incomes of \$35,000 to \$74,999 report talking with an HCP about eye health or disease. More adults with household incomes of \$75,000 or more (22%), \$35,000 to \$74,999 (15%), and \$15,000 to \$34,999 (15%) report talking about eye health or disease with coworkers or employers compared with those with household incomes below \$15,000 (9%).^c

Table 6-10: Whom People Talk to About Eye Health or Disease, by Income

Source	Overall	<\$14,999	\$15,000 to \$34,999	\$35,000 to \$74,999	\$75,000+
Relative or friend	43%	36%	43%	44%	48%
Eye care provider	42%	31%	40%	43%	50%
Health care provider	16%	14%	16%	14%	18%
Coworker(s) or employer	16%	9%	15%	15%	22%

Education

In the previous 12 months, more adults with a college degree or more education (48%) and those with some college education (46%) report talking about eye health or disease with a relative or friend compared with those with a high school diploma (42%) and those with only some high school education (31%) (see Table 6-11).^c More adults with a college degree or more education (52%) report talking about eye health or disease with an ECP compared with those with some college education (44%), those with a high school diploma (39%), and those with only some high school education (28%).^c Adults with some college education (18%), those with a college degree or more education (18%), and those with a high school diploma (15%) more frequently report talking with an HCP about eye health or disease compared with those with less than a high school education (9%).^c Lastly, more adults with a college degree or more education (18%) and those with some college education (18%) report talking about eye health or disease with coworkers or employers compared with those with a high school diploma (13%) and those with only some high school education (9%).^c

Table 6-11: Whom People Talk to About Eye Health or Disease, by Education

Source	Overall	<HS	HS diploma	Some college	College degree +
Relative or friend	42%	31%	42%	46%	48%
Eye care provider	41%	28%	39%	44%	52%
Health care provider	15%	9%	15%	18%	18%
Coworker(s) or employer	15%	9%	13%	18%	18%

Gender

In the previous 12 months, more women (48%) report talking about eye health or disease with a relative or friend than men (36%) (see Table 6-12).^c More women (46%) report talking about eye health or disease with an ECP compared with men (36%).^c Women (18%) more frequently report talking with an HCP about eye health or disease than men (13%).^c Lastly, more women (15%) report talking about eye health or disease with coworkers or employers compared with men (14%).

Table 6-12: Whom People Talk to About Eye Health or Disease, by Gender

Source	Overall	Male	Female
Relative or friend	42%	36%	48%
Eye care provider	41%	36%	46%
Health care provider	16%	13%	18%
Coworker(s) or employer	15%	14%	15%

CHAPTER 7: SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

The U.S. population is aging and the burden of age-related eye disease is growing ever more apparent. We undertook this survey to assess the knowledge, attitudes, and practices (KAP) associated with eye health and eye disease among a national sample of adults aged 18 and older. This type of information is essential for guiding programs and targeting messages to appropriate audiences to increase awareness, change attitudes, and effect change.

Summary of Report Highlights

Most adults report being in good to excellent health (83%) and having seen a health care provider (HCP) in the past two years (93%). An HCP can be a doctor, nurse practitioner, or other medical professional who has given physical examinations and/or writes prescriptions.¹² The vast majority of adults also report having visited an HCP within the past two years. Even though most adults (83%) describe their health as good, very good, or excellent, 43% of all adults report having one or more chronic health conditions (e.g., high blood pressure, arthritis, diabetes, heart disease, and/or cancer).

Two-thirds (66%) of all adults report wearing some type of eyewear. Of these adults, more adults wear their eyewear to view objects that are close up (75%) and more distant (70%) than to view objects at an intermediate distance (59%). Among those who report using some type of eyewear, 90% of adults report their eyesight as good, very good, or excellent when wearing their glasses or contact lenses. Among the 34% of adults who do not wear some type of eyewear, 88% report their eyesight as good, very good, or excellent.

More than nine out of 10 adults (91%) report ever having had their eyes examined by an HCP. Of these adults, 76% had their pupils dilated during the eye examination and 86% have had their eyes examined by an eye care provider (ECP). Among those having had their eyes examined, 74% had their last exam within the past two years. Among the 9% of all adults who report never having had their eyes examined by an HCP, more than half (60%) say they do not have their eyes examined because they do not have any problems and do not feel the need. The most frequently reported eye conditions, affecting 68% of adults, are refractive errors (i.e., nearsightedness or farsightedness).

¹² An HCP does not include ECPs.

To better understand possible differences in KAP among adults with a particular eye disease or condition, special subanalyses were conducted (see Appendix K). For glaucoma and glaucoma suspect, age-related macular degeneration (AMD), diabetic eye disease, and refractive errors, those with the disease or condition more frequently report having had their eyes examined in the past two years than those without the eye disease or condition. Similarly, for glaucoma and glaucoma suspect, AMD, diabetic eye disease, and refractive errors, those with the disease or condition more frequently report having had their eyes dilated than those without the eye disease or condition.

When asked to think about physical conditions that would affect their day-to-day living, 71% of adults report loss of eyesight as a 10 on a scale of 1 to 10, with 10 having the greatest effect. Interestingly, fewer adults who report having glaucoma, glaucoma suspect, AMD, diabetic eye disease, or refractive errors rate loss of eyesight a 10 than those without eye disease. This finding is perhaps indicative of a human tendency to cope with prevailing conditions.

Nearly all adults (96%) report that they would be likely to have their eyes examined if their primary care provider (PCP) suggested they do so, 79% would do so if a family member suggested it, and 68% would do so if a coworker or employer suggested it.

To learn more about adults' knowledge of certain eye disease and conditions, questions were asked about glaucoma, AMD, diabetic eye disease, and low vision. Ninety percent (90%) of all adults have heard of glaucoma. Of that group, 92% know that it can cause vision loss, 86% know it can be treated, and 67% know vision loss from glaucoma can be prevented. Only 8% know that there are no early warning symptoms. Those with glaucoma or glaucoma suspect are more knowledgeable than their unaffected counterparts.

Fifty-two percent (52%) of all adults have heard of AMD. Of that group, 70% know that AMD can cause central vision loss, 68% know that a person can have AMD and not know it, 46% know that vitamins and zinc help slow or prevent vision loss from AMD in some people, and 41% know AMD runs in families. Again, those who report having AMD are more knowledgeable about the condition than those who report not having it.

Fifty-one percent (51%) of all adults have heard of diabetic eye disease. Of that group, 92% know that people with diabetes are at higher risk for eye disease, 69% know that vision loss caused by diabetic eye disease can be prevented, 85% know that people with diabetes should have a dilated eye exam each year, and

59% know that vision loss caused by diabetes can be treated. All adults who report having diabetic eye disease (100%) correctly identify that people with diabetes should have a dilated eye exam at least once per year compared with 85% of those without the disease.^c

Sixteen percent (16%) of all adults have heard of low vision. Two percent (2%) of all adults have been told they have low vision.

The 2005 KAP Study reveals where adults have seen or heard something about eye health or disease in the past 12 months. Television programming and/or commercials are most often identified as a source of information on eye health or disease (24%), followed by a doctor's office or health clinic (17%), and magazines, newsletters, or newspapers (11%). Twenty-one percent (21%) of all adults have heard nothing about eye health or disease in the past 12 months. Significantly more Hispanics (41%) than Asians (28%), Blacks (26%), or Caucasians (16%) report not having seen or heard anything about eye health or disease in the past 12 months.^c

Summary of 1991 and 2005 KAP Comparisons

Although the 1991 data cannot be completely adjusted for statistical comparisons with the 2005 data, there are several noteworthy differences between the 1991 and 2005 KAP Studies (see Table 7-1). When examining the self-reported general health of adults 18 years and older, the percentage of adults who report their health as being good, very good, or excellent dipped by 2 percentage points between 1991 and 2005, from 85% to 83%. In 2005, more adults report being told by their doctor that they have diabetes (5% in 1991 and 10% in 2005) and high blood pressure (19% in 1991 and 27% in 2005).

The percentage of adults (66%) who report wearing some type of eyewear remained the same in 1991 and 2005. More adults appear to be taking better care of their eyes. In 2005, nine out of 10 adults believe their eyesight is good or better (a 3 percentage point increase from 1991), and nearly three out of four adults (74%) have had their eyes examined by an ECP in the past two years (a 9 percentage point increase from 1991). More women than men continue to report having had an eye exam in the past two years.

Between 1991 and 2005, there was a 4 percentage point increase in adults who were told by their ECP that they have an eye disease or condition. However,

^c p<.001

there was also a dramatic decrease (-22%) in the percentage of adults who were told by their ECP that they had a cataract and an 8 percentage point decrease in rates of glaucoma. Even though the rates of some eye disease and conditions decreased, the rate of nearsightedness increased from 11% in 1991 to 38% in 2005. There was a 12 percentage point increase between 1991 (39%) and 2005 (51%) in the number of adults who report having heard of diabetic eye disease. Most adults continue to report having heard of glaucoma.

Table 7-1: 1991 & 2005 KAP Data Comparisons

Survey Item	1991	2005	Difference
Adults who report their general health as being good, very good, or excellent	85%	83%	-2%
Adults who report they have the following chronic diseases:			
• Diabetes	5%	10%	5%
• High blood pressure	19%	27%	8%
• Heart disease	7%	7%	0%
• Arthritis	22%	21%	-1%
• Cancer	7%	6%	-1%
Adults who wear some type of eyewear	66%	66%	0%
Adults who report their eyesight as good or excellent (1991) or good, very good, or excellent (2005)	87%	90%	3%
Adults who have had their eyes examined by an ECP in the past two years	65%	74%	9%
Adults who report being told by an ECP that they have an eye condition or disease	18%	22%	4%
• Cataract	35%	13%	-22%
• Glaucoma	11%	3%	-8%
• Nearsightedness	11%	38%	27%
Adults who report having heard of glaucoma	91%	90%	-1%
Adults who report having heard of diabetic eye disease	39%	51%	12%

Conclusions

The overall survey findings may not be surprising, yet patterns and trends in the data merit closer monitoring and a more detailed examination. Of particular note is the general public's KAP regarding eye disease and conditions. The 2005 KAP Study shows that adults aged 18 and older are aware of eye disease and conditions, but few know certain important details about eye disease or conditions, such as that there are no early warning symptoms for glaucoma and diabetic eye disease.

The survey results indicate that Asian, Black, and Caucasian adults are more knowledgeable about eye disease, have different attitudes about eyesight, and

are more likely to have their eyes examined to prevent or detect eye disease or visual impairment than Hispanic adults. These findings suggest that more in-depth studies may be important to support strategic intervention efforts to influence eye health knowledge, attitudes, and practices of Hispanics to reduce ethnic disparities in eye disease and visual impairment.

The survey results show that adults report getting their eye health or disease information most frequently from television programs and commercials. Adults report that they also receive their eye health and disease information in their doctor's office and by newspapers and magazines. Only 1% of adults report getting their eye health or disease information from the Internet, and 2% hear such information on the radio.

The groups that have the most influence on the demand for and receipt of eye care services are PCPs, family members, and coworkers. The findings also reveal that religious leaders have an influence on Blacks and, to a lesser extent, Hispanics in terms of increasing the likelihood of receiving eye exams when compared with Asians or Caucasians. Because PCPs so clearly influence the eye health-seeking behaviors of adults, and because adults report seeing eye health information in doctors' offices, PCPs should be encouraged to have basic eye health and disease information available in their offices.

Recommendations

Given the increasing prevalence of eye disease and conditions and the development of new therapeutic strategies to prevent visual impairment seen with late-stage disease, efforts to educate the public about eye disease and strategies for addressing low vision are urgently needed (Congdon et al., 2004; Friedman et al., 2004a; Friedman et al., 2004b).

The 2005 KAP Study is an important source of information about what adults in the United States know, believe, and do about eye health and eye disease. As a result, we offer the following education and awareness recommendations to help ensure that the information gleaned from the 2005 KAP Study is used to its full advantage. These recommendations include ideas to improve the type of information adults have that can help them make informed decisions about their eye health needs.

Recommendation 1: Implement an educational effort to increase the general awareness of adults about the asymptomatic nature of eye disease and the importance of early detection and treatment.

Although most adults are familiar with common eye diseases, they lack key information that can facilitate early detection and treatment. There is a critical need to educate the public about glaucoma, diabetic eye disease, AMD, refractive errors, low vision, and the asymptomatic nature of these conditions. Relatively few adults know that there are no warning symptoms of eye disease, particularly for diabetic eye disease and glaucoma. Sixty-eight percent (68%) of all adults know that someone can have AMD and not know it, 11% know that eye disease caused by diabetes usually has no early warning symptoms, and 8% know that there are no early warning symptoms for glaucoma.

Previous educational efforts worked to increase the level of knowledge in some disease-specific areas, but the fact that eye disease has no early warning symptoms mandates regular eye examinations. Information and findings about the asymptomatic nature of eye disease and conditions could be the focus of an eye health educational effort. Educational strategies should be developed to encourage those at higher risk for eye disease and conditions, their family, and friends to learn more about their eye health and take an active role in the care of their eyes.

Recommendation 2: Implement a culturally appropriate educational effort for Hispanics to increase awareness about eye disease and conditions for which they are at higher risk for developing.

The U.S. population is becoming more ethnically diverse (Bernstein, 2006), and this diversity is evidenced by the differential knowledge of, attitudes toward, and practices regarding eye health and disease. Hispanics lack key information about protecting the health of their eyes and vision. The survey results indicate that Hispanic adults are less likely to have their eyes examined to prevent or detect eye disease or visual impairment than Asian, Caucasian, and Black adults. More Hispanics (41%) report that they have never seen or heard anything about eye health or disease in the past 12 months compared with Asians (28%), Blacks (26%), and Caucasians (16%).^c

The reported findings about Hispanics warrant the provision of health education efforts for eye disease and conditions to make them more applicable and accessible to this population and to convey the importance of eye examinations to preserve healthy vision. Materials need to be designed and developed in a culturally appropriate fashion that will inform this community about eye

disease, particularly the diseases for which Hispanics are at higher risk. Efforts could be made to provide information through media and other outlets such as community presentations (charla), neighborhood convenience stores (bodegas), and HCPs' offices that are accessed most by the Hispanic population.

Additionally, in-depth studies should be undertaken to support efforts to influence eye health knowledge, attitudes, and practices of Hispanics to reduce ethnic disparities in eye disease and conditions.

Recommendation 3: Provide information to primary care providers, as well as nurse practitioners, physician assistants, nurses, and other people who typically serve as gatekeepers for medical care, to increase their awareness of the need for regular comprehensive dilated eye examinations for all adults (especially people at higher risk for eye disease and conditions).

Ninety-three percent (93%) of adults have visited an HCP within the past two years. The 2005 KAP Study reveals that virtually all adults (96%) are likely to seek eye care if encouraged by their PCP. Based on the frequency of visits adults make to HCPs and the likelihood of adults to follow their PCP's suggestion to have their eyes examined, serious consideration should be given to having those providers who regularly see patients (e.g., PCPs, nurse practitioners, physician assistants) ask their patients about their eye health, assess whether their patients are at higher risk for eye disease, and refer them to an ECP for a comprehensive dilated eye exam, if appropriate.

An important issue worthy of consideration for enacting this recommendation is the role of a patient's insurance status. To support having HCPs recommend eye examinations to their adult patients, eye health information could be incorporated into medical school and nursing school curricula, and continuing medical education credits could be offered for an online course about eye care to help increase awareness about eye health.

References

- Bernstein, R. (2006). Nation's population one-third minority. Retrieved April 11, 2007, from <http://www.census.gov/Press-Release/www/releases/archives/population/006808.html>.
- Congdon, N., O'Colmain, B., Klaver, C. C. W., Klein, R., Munoz, B., Friedman, D., et al. (2004). Causes and prevalence of visual impairment among adults in the United States. *Archives of Ophthalmology*, 122, 477–485.
- Friedman, D. S., O'Colmain, B. J., Munoz, B., Tomany, S. C., McCarty, C., de Jong, P., et al. (2004a). Prevalence of age-related macular degeneration in the United States. *Archives of Ophthalmology*, 122, 564–572.
- Friedman, D. S., Wolfs, R. C., O'Colmain, B. J., Klein, B. E., Taylor, H. R., West, S., et al. (2004b). The prevalence of open-angle glaucoma among adults in the United States. *Archives of Ophthalmology*, 122, 532–538.

APPENDIX A

Final 2005 KAP Survey

FINAL 2005 KAP Survey

Introduction to KAP Survey:

Intro. Hello, my name is _____, calling on behalf of the Lions Clubs International (Foundation). We are conducting a public opinion study on your knowledge, attitudes, and practices about eye health and eye disease.

[READ IF NECESSARY: Your telephone number has been chosen randomly, and I would like to ask you some questions about your knowledge, attitudes, and practices related to eye health and eye disease.

[READ IF NECESSARY: We are not selling anything and we are not asking for donations.]

Is this (phone number) ?

- 01 Yes [GO TO INTROA)
- 02 No

Term1: Thank you very much, but I seem to have dialed the wrong number. It is possible that your number may be called at a later time. **TERMINATE**

INTROA. Is this a **private residence**?

- 01 Yes [GO TO INTROB]
- 02 No

Term2: Thank you very much, but we are only interviewing private residences. Thank you for your time. **TERMINATE**

INTROB: Is this a **cellular telephone**?

- 01 Yes
- 02 No [GO TO S1]

Term3. Thank you very much, but we are only interviewing landline telephones and private residences. Thank you for your time. **TERMINATE**

S1_1. I need to randomly select one adult who lives in your household to be interviewed. How many members of your household, including yourself, are 18 years of age or older?

___ Number of adults

If **S1_1="1 adult" ask:**

S1_2. Are you the adult? [Interviewer: Enter 1 male or 1 female below. **Ask gender if necessary.** "Just to confirm, this is a single adult {female/male} household."]

- 01 Yes, male
- 02 Yes, female
- 03 No [GO TO S1_2b]

If **"Yes" say:**

S1_2a. Then you are the person I need to speak with.

Go to "Correct Respondent", PARAGRAPH 2.

If **"No" say:**

S1_2b. Is the adult a man or a woman? [Interviewer: Enter 1 man or 1 woman below].

- 01 Man
- 02 Woman

S1_2c. May I speak with **[fill in (him/her)** from previous question]?]

- 01 Yes [GO TO CORRECT RESPONDENT]
- 02 No, not available [GO TO CALLBACK]

If **S1_1 >1**

S1_3a. How many of these adults are men?

___ Number of men

S1_3b. How many of these adults are women?

___ Number of women

S1_4. The person in your household that I need to speak with is _____
(computer randomly selects and names the person (by saying “oldest female”, youngest male, etc.) Would that be you?

Yes [GO TO CORRECT RESPONDENT, PARAGRAPH 2]
No

May I speak to this person?

Yes [GO TO CORRECT RESPONDENT]
No, not available [GO TO CALLBACK]

Correct Respondent (Read)

[Paragraph 1]

Hello, I am calling for the Lions Clubs International Foundation. My name is (name). We are gathering information about eye health and eye disease. The survey is conducted by the Lions Clubs International Foundation. Your telephone number has been chosen randomly, and I would like to ask you some questions about your knowledge, attitudes, and practices related to eye health and eye disease.

[Paragraph 2]

Your participation in the study is voluntary. I will not ask for your name, address, or other personal information that can identify you. Any information you give me will be confidential. You can decline to participate. If you choose to participate, you do not have to answer any question you don't want to, and you can end the interview at any time.

[READ IF NECESSARY: The interview takes about 15 minutes to complete.]

If you have any questions about this survey, I will provide a telephone number for you to call to get more information. The call may be monitored for quality assurance purposes.

[INTERVIEWER: Provide telephone numbers only if requested]

Lions Clubs International Foundation: Rebecca Daou – (630) 571-5466 ext.394
ORC Macro Project Director: Arlen Rosenthal – (301) 572-0222

I. General Health

The first few questions are about your health.

1. In general, would you say your health is:

- Excellent.....01
- Very good02
- Good03
- Fair, or04
- Poor05
- Don't know / Not sure.....77
- Refused.....99

2. About how long ago was the last time you saw or visited a health care provider? By health care provider, I mean a doctor, a nurse practitioner, or any other medical professional who has given you a physical examination or written prescriptions for you. **(PROBE ONLY IF NECESSARY BY READING RANGES)**

- Within the past month (anytime less than 1 month ago).....01
- Within the past year (1 month but less than 12 months ago)02
- Within the past 2 years (1 year but less than 2 years ago).....03
- 2 or more years ago04
- DON'T** Never05
- READ→** Don't know / Not sure77
- Refused99

3. Have you ever been told by a health care provider that you have... **(READ each disease/condition) (IF "YES" GO TO Q4; IF "NO" TO ALL CONDITIONS SKIP TO Q5)**

[INTERVIEWER: CODE GESTATIONAL DIABETES AS YES FOR DIABETES]

	<u>Yes</u>	<u>No</u>	<u>DK</u>	<u>Refused</u>
a. Diabetes?	01	02	77	99
b. High blood pressure?	01	02	77	99
c. Heart disease?	01	02	77	99
d. Arthritis?	01	02	77	99
e. Cancer?	01	02	77	99

4. Are you seeking or receiving treatment or have you received treatment in the past for **[INSERT each "yes" in Q3 here]** from a health care provider?

	<u>Yes</u>	<u>No</u>	<u>DK</u>	<u>Refused</u>
a. Diabetes?	01	02	77	99
b. High blood pressure?	01	02	77	99
c. Heart disease?	01	02	77	99
d. Arthritis?	01	02	77	99
e. Cancer?	01	02	77	99

5. Now I'm going to ask you about how you think certain conditions would affect your day-to-day life. On a scale of 1 to 10, with 1 having the least impact and 10 having the greatest impact on your daily life, how would you rate: [insert condition]. **(READ this for each disability)**

RANDOMIZE ORDER

..... Rating	Can't Decide / Don't Know
a. Losing your memory..... _____	77
b. Losing your hearing _____	77
c. Losing your eyesight _____	77
d. Losing your speech, or _____	77
e. Losing an arm or a leg _____	77
DON'T Refused..... _____	99

READ→

5_OPEN. Can you tell me a little more about why you rated those items the way that you did?

- 01 Record response[PROGRAMMER ADD TEXT BOX]
- 77 Don't know
- 99 Refused

II. Eye Health

6. Do you wear... [INTERVIEWER: Read all responses]

Glasses 01	→(GO TO Q7)
Contact lenses 02	→(GO TO Q7)
Both glasses and contact lenses 03	→(GO TO Q7)
Reading glasses only, or 04	→(GO TO Q7)
None of the above 05	→(GO TO Q9)
Don't know / Not sure..... 77	→(GO TO Q9)
Refused..... 99	→(GO TO Q9)

7. Did an eye care provider prescribe or recommend the glasses or contact lenses you currently wear? By eye care provider, I mean an eye doctor or eye specialist, like an optometrist or ophthalmologist who conducts eye exams.

- Yes 01
- No 02
- Don't know / Not sure..... 77
- Refused..... 99

8. At the present time, would you say your eyesight, with glasses or contact lenses when you wear them, is...

- Excellent 01
- Very Good 02
- Good 03
- Fair, or 04
- Poor 05
- Don't know / Not sure 77
- Refused 99

→ (SKIP TO Q10)

9. Would you say your eyesight is:

- Excellent 01
- Very Good 02
- Good 03
- Fair, or 04
- Poor 05
- Don't know / Not sure 77
- Refused 99

→ SKIP to Q11

10. Do you wear your glasses or contact lenses... (READ each use of glasses or contact lenses)

	<u>Yes</u>	<u>No</u>	<u>DK</u>	<u>Refused</u>
.....				
a. ...to see things that are close up, like sewing or reading?	01	02	77	99
b. ...to see things at an intermediate distance, like a computer, or looking at yourself in a mirror?	01	02	77	99
c. ...to see things that are more distant, like while driving or watching TV?01	02	77	99	

11. Has an eye care provider ever told you that you have an eye condition or disease?

- Yes 01
- No 02
- Don't know / Not sure 77
- Refused 99

12. Has an eye care provider ever told you that you have? **(READ each eye disease/condition)
(IF “YES” GO TO Q13; IF “NO” TO ALL CONDITIONS SKIP TO Q14)**

RANDOMIZE ORDER

.....	<u>Yes</u>	<u>No</u>	<u>DK</u>	<u>Refused</u>
a. Amblyopia (amblee-o-p-ah) or “lazy eye” where one eye is stronger than the other	01	02	77	99
b. Cataract—a clouding of the lens of the eye	01	02	77	99
c. Diabetic retinopathy or diabetic eye disease— a complication of diabetes that affects your vision ..	01	02	77	99
d. Glaucoma—a disease that damages the optic nerve and causes loss of side or peripheral vision (IF NO, GOTO 12e. IF YES SKIP TO 12f)	01	02	77	99
e. Suspect for glaucoma - have you been told that you have high eye pressure or an unusual appearance to your optic nerve?	01	02	77	99
f. Age-related macular degeneration—an eye disease that affects older people and causes a loss of central or straight-ahead vision	01	02	77	99
g. Nearsightedness—trouble seeing things that are far away [also known as myopia]	01	02	77	99
h. Farsightedness—trouble seeing things that are close up [also known as hyperopia]	01	02	77	99
i. Any other eye condition or eye disease? (SPECIFY)_____	01	02	77	99

13. Are you receiving follow up care or treatment for [INSERT “YES” response from Q12 above]? This would include regular eye exams and getting glasses and/or contact lenses.

.....	<u>Yes</u>	<u>No</u>	<u>DK</u>	<u>Refused</u>
a. Amblyopia (amblee-o-p-ah) or “lazy eye”	01	02	77	99
b. Cataract	01	02	77	99
c. Diabetic retinopathy	01	02	77	99
d. Glaucoma	01	02	77	99
e. Suspect for glaucoma	01	02	77	99
f. Macular degeneration	01	02	77	99
g. Nearsightedness	01	02	77	99
h. Farsightedness	01	02	77	99
i. Other(s) (SPECIFY)_____	01	02	77	99

14. Have you ever had an eye injury or trauma requiring a doctor's care in the emergency room or at a doctor's office?

Yes.....	01	→(GO TO Q15)
No.....	02	→(GO TO Q18)
Don't know / Not sure.....	77	→(GO TO Q18)
Refused.....	99	→(GO TO Q18)

15. For the last eye injury or trauma that you can remember, how did it occur? **(DO NOT READ)**
(PROBE WITH LIST IF NECESSARY) [SELECT ALL THAT APPLY] [MUL=7]
- 01. Playing sports/recreational activity.....
 - 02. Working on a hobby
 - 03. At your job or in the workplace
 - 04. In a motor vehicle
 - 05. While gardening/lawn care
 - 06. In the home
 - 07. Other(s) **(SPECIFY)**_____
 - 77. Don't remember / don't know / unsure
 - 99. Refused.....
16. Have you experienced a permanent change in your vision or permanent loss of vision because of this injury or trauma?
- Yes.....01
 - No.....02
 - Don't know / Not sure.....77
 - Refused.....99
17. Did you have to stay in a hospital overnight or longer because of this injury or trauma?
- Yes.....01
 - No.....02
 - Don't know / Not sure.....77
 - Refused.....99

III. Eye Examinations: Experiences and Attitudes

The next few questions are about eye examinations.

18. Have you ever had your eyes examined by a health care provider? This includes your primary care provider as well as eye care providers.
- Yes01 → **(GO TO Q19)**
 - No02 → **(GO TO Q23)**
 - Don't know / Not sure77 → **(GO TO Q23)**
 - Refused.....99 → **(GO TO Q23)**
19. Were your pupils dilated—that is, drops would have been placed in your eyes, and might have caused blurry vision or sensitivity to light?
- Yes01
 - No02
 - Don't know / Not sure77
 - Refused.....99

20. When you typically have your eyes examined, who examines them? Please do not include getting fitted for glasses or contact lenses. Is it...

An eye care provider	01
Your primary care provider, or	02
Someone else (SPECIFY).....	03
DON'T Don't know / Not sure	77
READ→ Refused	99

21. When was the last eye examination you had by an eye care provider such as an ophthalmologist or optometrist? (**DO NOT READ**) (**PROBE ONLY IF NECESSARY BY READING RANGES**)

Within the past month (anytime less than 1 month ago).....	01	→(GO TO Q22)
Within the past year (1 month but less than 12 months ago)	02	→(GO TO Q22)
Within the past 2 years (1 year but less than 2 years ago).....	03	→(GO TO Q22)
2 or more years ago	04	→(GO TO Q22)
DON'T Never	05	→ (SKIP TO Q23)
READ→ Don't know / Not sure	77	→ (SKIP TO Q24)
Refused	99	→ (SKIP TO Q24)

22. What was the **one MAIN** reason you had your eyes examined the last time by an eye care provider? (**DO NOT READ.**)

For a regular check up	01
You needed new eye glasses or contact lenses	02
You had trouble-seeing	03
You had pain in your eyes	04
You had headaches	05
You had an eye infection, injury, or eye disease	06
You received a notice from your eye care provider for a regular eye examination	07
A family member or a friend suggested you go	08
You were referred by another health care provider	09
Some other reason (SPECIFY).....	11
Don't know / Not sure	77
Refused.....	99

→ **SKIP to Q24**

23. Is there a particular or **one MAIN** reason why you have never had your eyes examined by an eye care provider? **(DO NOT READ)**

I haven't had any problems and haven't felt the need for an eye exam01
 My primary care provider has not told me to have an eye examination02
 I have had other, more important health problems03
 I can get along well enough with my eye problem04
 I don't like doctors and avoid them05
 I don't want to know if something is wrong06
 The examination might be painful07
 I would lose time from my work08
 The examination costs too much09
 Transportation is a problem10
 Not covered by insurance11
 Cannot find an eye care provider who speaks my language12
 There are no places or doctors close enough to where I live or work13
 I am not sure where to go to have an eye examination14
 No time, never got around to it15
 Never thought about it16
 Other (SPECIFY).....17
 Don't know / Not sure77
 Refused99

24. Different kinds of people can help others to take better care of your health. I'm going to ask you about what you would do if the following people said you should have an eye exam. For each one, please tell me if you would be very likely, somewhat likely, or not likely at all to have an eye exam.

If **[INSERT a., b., c., d., e., and f. below]** said that you needed to have your eyes examined, would you be very likely, somewhat likely, or not likely at all to have an eye exam?

RANDOMIZE ORDER	<u>Very Likely</u>	<u>Somewhat Likely</u>	<u>Not Likely at all</u>	<u>Don't know/ Depends</u>	<u>Refused</u>
a. Family members	01	02	03	77	99
b. Your primary care provider	01	02	03	77	99
c. Your pharmacist	01	02	03	77	99
d. Your friends	01	02	03	77	99
e. Co-workers/employer	01	02	03	77	99
f. Religious leader	01	02	03	77	99

IV. Knowledge About Eye Disease

The next few questions are about eye disease.

25. Have you ever heard of glaucoma?

Yes	01	→ (GO TO Q26)
No	02	→ (GO TO Q27)
Don't know / Not sure	77	→ (GO TO Q27)
Refused	99	→ (GO TO Q27)

26. I'm going to read you some statements about glaucoma. Please tell me if you think the statement is true or false. If you aren't sure, please tell me. **(REPEAT "true, false, not sure" AS NECESSARY.)**

RANDOMIZE ORDER

	<u>True</u>	<u>False</u>	<u>Not Sure</u>	<u>Refused</u>
a. Glaucoma can cause vision loss. Is this true, false or are you not sure?	01	02	77	99
b. There are early warning symptoms for glaucoma -- true, false, or not sure?	01	02	77	99
c. Vision loss from glaucoma can be prevented	01	02	77	99
d. Glaucoma can be treated	01	02	77	99

27. Have you ever heard of age-related macular degeneration?

Yes	01	→ (GO TO Q28)
No	02	→ (GO TO Q29)
Don't know / Not sure	77	→ (GO TO Q29)
Refused	99	→ (GO TO Q29)

28. I'm going to read you some statements about age-related macular degeneration (AMD). Please tell me if you think the statement is true or false. If you aren't sure, please tell me. **(REPEAT "true, false, not sure" AS NECESSARY.)**

RANDOMIZE ORDER

	<u>True</u>	<u>False</u>	<u>Not Sure</u>	<u>Refused</u>
a. Vitamins and zinc can help prevent vision loss from AMD in some people. Is this true, false or are you not sure?	01	02	77	99
b. AMD usually runs in families-- true, false, or not sure?	01	02	77	99
c. A person can have AMD and not know it?	01	02	77	99
d. AMD can cause central vision loss?	01	02	77	99

29. Have you ever heard of diabetic eye disease such as diabetic retinopathy?

- Yes 01 → (GO TO Q30)
- No 02 → (GO TO Q31)
- Don't know / Not sure 77 → (GO TO Q31)
- Refused 99 → (GO TO Q31)

30. I am going to read some statements about diabetes and diabetic eye disease. Again, I would like you to tell me if you think the statement is true or false. If you aren't sure, please tell me.

RANDOMIZE ORDER

	<u>True</u>	<u>False</u>	<u>Not Sure</u>	<u>Refused</u>
a. People with diabetes are at higher risk for eye disease than people without diabetes. Is this true, false, or are you not sure?	01	02	77	99
b. Eye disease caused by diabetes usually has early warning symptoms	01	02	77	99
c. Vision loss caused by diabetes can be prevented	01	02	77	99
d. People with diabetes should have a dilated eye exam at least once a year.	01	02	77	99
e. Eye disease caused by diabetes cannot be treated.	01	02	77	99

Now I'm going to ask you some questions about low vision.

31. Have you ever heard the term "low vision"?

- Yes 01
- No 02
- Don't know / Not sure 77
- Refused 99

32. Low vision is poor vision which is not corrected by eyeglasses, contact lenses, medication, or surgery, that interferes with your ability to perform everyday activities. Have you ever been told by an eye care provider that you have low vision?

- Yes 01 → (GO TO Q33)
- No 02 → (GO TO Q36)
- Don't know / Not sure 77 → (GO TO Q36)
- Refused 99 → (GO TO Q36)

33. Did your eye care provider ever recommend that you see a low vision specialist? A low vision specialist is an ophthalmologist or optometrist who has received special training in the evaluation of low vision. This person can prescribe visual devices and teach people how to use them.

- Yes 01 → (GO TO Q34)
- No 02 → (GO TO Q36)
- Don't know / Not sure 77 → (GO TO Q36)
- Refused 99 → (GO TO Q36)

34. Have you seen a low vision specialist?
- Yes01 → (GO TO Q36)
 - No02 → (GO TO Q35)
 - Don't know / Not sure77 → (GO TO Q36)
 - Refused99 → (GO TO Q36)

35. What was the main reason you did not see a low vision specialist? (DO NOT READ)
(PROBE IF NECESSARY)

- I haven't had any problems and haven't felt the need to see a specialist01
- I have had other, more important health problems02
- I can get along well enough with my eye problem03
- I don't like doctors and avoid them04
- I don't want to know if something is wrong05
- It might be painful06
- I would lose time from my work07
- Transportation is a problem08
- Not covered by insurance09
- The low vision specialist does not speak my language 10
- There are no places or doctors close enough to
where I live or work 11
- No time, never got around to it.....12
- Other (SPECIFY) _____13
- Don't know / Not sure77
- Refused99

Now let's talk about visual devices that may be used in your day-to-day activities.

36. Do you currently use any type of visual device(s) for low vision such as a magnifier or telescope?
- Yes01 → (GO TO Q37)
 - No02 → (GO TO Q39)
 - Don't know / Not sure77 → (GO TO Q39)
 - Refused99 → (GO TO Q39)

37. Did you get instruction on how to use (this/these) device(s)?
- Yes01
 - No02
 - Don't know / Not sure77
 - Refused99

38. How important would you say the device(s) is/are in your day-to-day activities?
- Very important01
 - Somewhat important02
 - Not too important.....03
 - Not important at all04
 - Don't know / Not sure77
 - Refused99

39. Did you use any of the following assistive devices because of problems with your vision?
(READ EACH OF THE ASSISTIVE DEVICES)

RANDOMIZE ORDER (a-f)

	<u>Yes</u>	<u>No</u>	<u>DK</u>	<u>Refused</u>
a. Large print materials	01	02	77	99
b. Talking books	01	02	77	99
c. Other talking items (such as clocks, watches, calculators)	01	02	77	99
d. A white cane (that visually impaired and blind people often use).....	01	02	77	99
e. A computer adapted with large print screen or voice out-put.....	01	02	77	99
f. A guide dog	01	02	77	99
g. Other adaptive device (SPECIFY) _____	01	02	77	99

[IF "YES" to any item in Q39_a-g]

40. Overall, how important would you say the device(s) are in your day-to-day activities?

Very important	01
Somewhat important	02
Not too important.....	03
Not important at all	04
Don't know / Not sure.....	77
Refused	99

V. Information Sources

The next several questions are about health information sources.

41. During the past 12 months, where have you seen or heard something about eye health or disease?
(DO NOT READ.) (PROBE IF ANSWER GIVEN: Where else have you seen or heard something about eye health or eye disease?) (SELECT ALL THAT APPLY.) [MUL=13]

Magazines or newsletters	01
Daily or weekly newspapers.....	02
Educational pamphlets or brochures	03
Drugstore or supermarket	04
Television programs or commercials	05
Radio programs or commercials	06
Religious or social organizations you belong to	07
Online – on the Internet or WWW	08
At a doctor's office, clinic, or community health screening	09
At your office or workplace.....	10
From relatives or friends	11
From a health information hotline	12
Other (SPECIFY) _____	13
Haven't seen/heard anything about eye health or disease.....	14
Don't know / Not sure.....	77
Refused	99

42. Now I'm going to ask about people you may have talked with about eye health or eye disease. In the past 12 months, have you talked about eye health or eye disease with _____?

RANDOMIZE ORDER (a-e)	<u>Yes</u>	<u>No</u>	<u>DK</u>	<u>Refused</u>
a. A health care provider who is not an eye care provider (eye doctor)?.....	01	02	77	99
b. A pharmacist?	01	02	77	99
c. A relative or friend?	01	02	77	99
d. An eye care provider (eye doctor).....	01	02	77	99
e. A co-worker(s)/employer	01	02	77	99
f. Anyone else (SPECIFY)_____	01	02	77	99

VI. Insurance

I'd like to ask you a few questions about health insurance

43. Do you have any kind of health care coverage, including health insurance, prepaid plans such as HMOs, or government plans such as Medicare?

Yes	01	➔(GO TO Q44)
No	02	➔(GO TO Q48)
Don't know / Not sure	77	➔(GO TO Q48)
Refused	99	➔(GO TO Q48)

44. What type of health care coverage do you have? **(READ RESPONSE OPTIONS.) (SELECT ALL THAT APPLY.) [MUL=5]**

Medicare	01
Medicaid	02
Military health insurance (such as TRICARE or VA)	03
Private insurance (including HMO's [Health Maintenance Organization], and PPO's [Preferred Provider Organization]... ..	04
Other (SPECIFY) _____	05
Don't know / Not sure	77
Refused	99

45. How much of the cost of a regular eye exam provided by an eye care provider is covered by your health care coverage (and/or vision insurance, if you have it)? **[NOTE: vision insurance is sometimes included in your health care coverage and other times may be an additional insurance that covers the cost of eye exams, glasses, contact lenses, and other visual devices.]**

All	01
Part	02
None	03
Don't know / Not sure	77
Refused	99

46. Does your health care coverage (and/or vision insurance, if you have it) pay for any part of the cost of glasses or contact lenses?

- Yes 01
- No 02
- Don't know / Not sure 77
- Refused 99

47. Does your health care coverage (and/or vision insurance, if you have it) pay for any part of visual devices that are prescribed by an eye care professional such as magnifiers, telescopes, optical scans, and CCTVs?

- Yes 01
- No 02
- Don't know / Not sure 77
- Refused 99

The last few questions are to help us better understand the people who respond to this survey. Your answers will be kept completely confidential.

VII. Demographic

48. What is the last grade in school you completed? **(PROBE IF NECESSARY BY READING RESPONSES)**

- Some high school (not completed) or less 01
- High school diploma or equivalent 02
- Some college, but less than 4-year degree 03
- Four year college degree completed 04
- Graduate school started or completed 05
- DON'T**
- READ- ▶** Don't know / Not sure 77
- Refused 99

49. Are you currently:

- Married 01
- Divorced or separated 02
- Widowed, or 03
- Single (never married) 04
- Don't know / Not sure 77
- Refused 99

50. How many adults and children presently live in your household, counting yourself?

77 Don't know
99 Refused

51a. May I have your age as of your last birthday?

77 Don't know
99 Refused

[If 51a=77 or 99] ask

51b. Which one of the following categories best represents your age as of your last birthday? **[READ]**

Under 2501
25-34..... 02
35-44..... 03
45-54..... 04
55-64 05
65-74 06
75 years and older.....07
Refused99

52. Are you of Hispanic origin or descent?

Yes 01
No 02
Don't know 77
Refused 99

53. Which one or more of the following best describes your race? **[Read list and choose all that apply]**
[MUL=6]

American Indian and Alaska Native 01
Asian 02
Native Hawaiian and Other Pacific Islander 03
Black or African American 04
Caucasian 05
Other (specify _____) 06
Don't know 77
Refused 99

54. Finally, I'd like to read a series of income groups. Please stop me when I read the group which describes your TOTAL HOUSEHOLD INCOME BEFORE TAXES IN 2004.

(READ IF NECESSARY: Income is important in analyzing the health information we collect. For example, this information helps us to learn whether **persons** in one income group use certain types of medical care services more or less often than those in other groups.)

Less than \$10,000	01
\$10,000 to \$14,999	02
\$15,000 to \$24,999	03
\$25,000 to \$34,999	04
\$35,000 to \$49,999	05
\$50,000 to \$74,999	06
\$75,000 to \$99,999	07
\$100,000 to \$149,999	08
\$150,000 to \$199,999	09
\$200,000 or more	10
DON'T READ → Don't know	77
Refused	99

55. **[READ ONLY IF NECESSARY]** One last question... for purposes of classifying your responses, please tell me your gender.

Male	01
Female	02
Refused	99

THANK YOU FOR YOUR TIME. WE APPRECIATE YOUR ASSISTANCE VERY MUCH.

A STATE CODE GEOGRAPHIC SIZE CODE (E.G., URBAN SUBURBAN, RUAL) WILL BE ADDED, AFTER INTERVIEWING, BASED ON SAMPLE FILE.

2005 KAP Survey in Spanish

Privacy manager and answering machine protocol:

Please add logic and the following text on the 4th and 9th instance of a privacy manager or answering machine:

Hola, mi nombre es _____, y le llamo en nombre de la Fundación Club de Leones Internacional. Estamos llevando a cabo un estudio de la opinión pública sobre la salud y las enfermedades de los ojos. No vendemos nada, tampoco pedimos donaciones. Por favor llámenos al 1-800-778-3791 en un horario que sea conveniente para usted. Nos gustaría escuchar su opinión. Gracias.

Privacy Managers: If the message asks to identify who or what company is calling: "Le llamamos a nombre de la Fundación Club de Leones Internacional."

If the message asks to enter a phone number: Enter the call center's toll free number (1-800-778-3791).

FINAL 2005 KAP Survey

Introduction to KAP Survey:

Intro. Hola, mi nombre es _____, y le llamo en nombre de la Fundación Club de Leones Internacional. Estamos llevando a cabo un estudio de la opinión pública sobre sus conocimientos, actitudes y prácticas sobre la salud de los ojos y las enfermedades de los ojos.

[READ IF NECESSARY: Su número de teléfono ha sido elegido al azar, y deseo hacerle algunas preguntas sobre sus conocimientos, actitudes y prácticas sobre la salud y las enfermedades de los ojos.

[READ IF NECESSARY: No vendemos nada ni pedimos donaciones.]

¿Es este el (phone number) ?

- 03 Yes [GO TO INTROA)
- 04 No

Term1: Muchas gracias, pero parece que he marcado un número equivocado. Es posible que llamen a su número más adelante. **TERMINATE**

INTROA. ¿Es esta una **residencia** privada?

- 03 Yes [GO TO INTROB]
- 04 No

Term2: Muchas gracias, pero sólo entrevistamos residencias privadas. Gracias por su tiempo. **TERMINATE**

INTROB: ¿Es este un **teléfono celular**?

- 03 Yes
- 04 No [GO TO S1]

Term3. Muchas gracias, pero sólo entrevistamos teléfonos con línea fija y residencias privadas. Gracias por su tiempo. **TERMINATE**

S1_1. Necesito seleccionar al azar a un adulto que viva en su hogar para entrevistarlo. ¿Cuántos miembros de su hogar, incluido usted tienen un mínimo de 18 años de edad?

— Number of adults

If **S1_1**="1 adult" ask:

S1_2. ¿Es usted el adulto? [Interviewer: Enter 1 male or 1 female below. **Ask gender if necessary.** “Sólo para confirmar, éste es un hogar con un solo adulto {mujer/ hombre}”]

- 04 Yes, male
- 05 Yes, female
- 06 No [GO TO S1_2b]

If “**Yes**” say:

S1_2a. Entonces usted es la persona con la que necesito hablar.

Go to “Correct Respondent,” PARAGRAPH 2.

If “**No**” say:

S1_2b. ¿Es el adulto un hombre o una mujer? [Interviewer: Enter 1 man or 1 woman below].

- 03 Man
- 04 Woman

S2_c. ¿Puedo hablar con [fill in (él/ ella) from previous question]?

- 02 Yes [GO TO CORRECT RESPONDENT]
- 02 No, not available [GO TO CALLBACK]

If **S1_1 >1**

S1_3a. ¿Cuántos de estos adultos son hombres?

___ Number of men

S1_3b. ¿Cuántos de estos adultos son mujeres?

___ Number of women

S1_4. La persona de su hogar con la que necesito hablar es _____ (computer randomly selects and names the person (by saying “oldest female”, youngest male, etc.)
¿Es usted esa persona?

- Yes [GO TO CORRECT RESPONDENT, PARAGRAPH 2]
- No

¿Puedo hablar con esta persona?

Yes [GO TO CORRECT RESPONDENT]
No, not available [GO TO CALLBACK]

Correct Respondent (Read)

[Paragraph 1]

Hola, le llamo de parte de la Fundación Club de Leones Internacional. Mi nombre es **(nombre)**. Estamos recopilando información sobre la salud y las enfermedades de los ojos. La encuesta se lleva a cabo por la Fundación Club de Leones Internacional. Su número de teléfono ha sido elegido al azar, y deseo hacerle algunas preguntas sobre sus conocimientos, actitudes y prácticas relacionadas con la salud y las enfermedades de los ojos.

[Paragraph 2]

Su participación en este estudio es voluntaria. No voy a preguntarle su nombre, dirección u otra información personal que pueda identificarle. Cualquier información que me brinde será confidencial. Puede rehusarse a participar. Si decide participar, no tiene que contestar ninguna pregunta que no desee y puede terminar la entrevista en cualquier momento.

[READ IF NECESSARY: La entrevista toma alrededor de 15 minutos en completarse. Si tiene alguna duda sobre esta encuesta, le daré un número de teléfono para que llame y obtenga más información. La llamada podría ser escuchada para asegurar la calidad.

[INTERVIEWER: Provide telephone numbers only if requested]

Fundación Club de Leones Internacional : Rebecca Daou – (630) 571-5466 ext.394
Directora del proyecto en ORC Macro: Arlen Rosenthal – (301) 572-0222

I. General Health

Las primeras preguntas son acerca de su salud.

1. En general, diría usted que su salud es:

Excelente.....	01
Muy buena	02
Buena	03
Regular, o	04
Mala	05
Don't know / Not sure.....	77
Refused.....	99

2. ¿Aproximadamente cuánto hace que vio o visitó por última vez a un proveedor de atención médica? Por proveedor de atención médica, quiero decir un médico, una enfermera graduada, o cualquier otro profesional médico que lo haya sometido a un examen físico o le haya dado una receta.
(PROBE ONLY IF NECESSARY BY READING RANGES)

Dentro del último mes (en cualquier momento hace menos de 1 mes)	01
Dentro del último año (hace más de 1 mes pero menos de 12 meses)	02
Dentro de los últimos 2 años (hace más de 1 año pero menos de 2 años)	03
Hace 2 o más años	04
DON'T Never	05
READ→ Don't know / Not sure	77
Refused	99

3. ¿Alguna vez le ha dicho un proveedor de atención médica que tiene... **(READ each disease/condition)**
(IF "YES" GO TO Q4; IF "NO" TO ALL CONDITIONS SKIP TO Q5)

[INTERVIEWER: CODE GESTATIONAL DIABETES AS YES FOR DIABETES]

	<u>Yes</u>	<u>No</u>	<u>DK</u>	<u>Refused</u>
a. Diabetes?	01	02	77	99
b. Alta presión arterial?	01	02	77	99
c. Enfermedad cardíaca (del corazón)?	01	02	77	99
d. Artritis?	01	02	77	99
e. Cáncer?	01	02	77	99

4. ¿Está buscando o recibiendo tratamiento o ha recibido tratamiento en el pasado por [INSERT each "yes" in Q3 here] de parte de un proveedor de atención médica?

	<u>Yes</u>	<u>No</u>	<u>DK</u>	<u>Refused</u>
a. Diabetes?	01	02	77	99
b. Alta presión arterial?	01	02	77	99
c. Enfermedad cardíaca (del corazón)?	01	02	77	99
d. Artritis?	01	02	77	99
e. Cáncer?	01	02	77	99

5. Ahora voy a preguntarle acerca de lo que piensa sobre cómo afectarían ciertas afecciones su vida diaria. En una escala de 1 a 10, siendo 1 la de menor impacto y 10 la de mayor impacto sobre su vida diaria, como valoraría: [insert condition]. **(READ this for each disability)**

RANDOMIZE ORDER

.....	Rating	Can't Decide / Don't Know
a. Perder la memoria.....	_____	77
b. Perder la audición	_____	77
c. Perder la visión	_____	77
d. Perder el habla o	_____	77
e. Perder un brazo o una pierna	_____	77
DON'T Refused.....		99

READ→

5_OPEN. ¿Puede decirme más acerca de porqué valoró esos ítems como lo hizo?

02	Record response	[PROGRAMMER ADD TEXT BOX]
78	Don't know	
100	Refused	

II. Eye Health

6. Usa usted... [INTERVIEWER: Read all responses]

Anteojos	01	→(GO TO Q7)
Lentes de contacto	02	→(GO TO Q7)
Anteojos y lentes de contacto	03	→(GO TO Q7)
Anteojos para leer solamente, o	04	→(GO TO Q7)
Ninguno de los anteriores	05	→(GO TO Q9)
Don't know / Not sure.....	77	→(GO TO Q9)
Refused.....	99	→(GO TO Q9)

7. ¿Le recetó o recomendó un proveedor de atención de la vista los anteojos o lentes de contacto que usa actualmente? Por proveedor de atención de la vista, quiero decir un oculista o especialista de los ojos como un optometrista u oftalmólogo que realiza exámenes de los ojos.

Yes	01
No	02
Don't know / Not sure.....	77
Refused.....	99

8. En este momento, diría usted que su visión con anteojos o lentes de contacto cuando los usa es...

Excelente	01
Muy buena	02
Buena	03
Regular, o.....	04
Mala	05
Don't know / Not sure	77
Refused	99

→ (SKIP TO Q10)

9. ¿Diría usted que su visión es:

Excelente?	01
Muy buena?	02
Buena?.....	03
Regular?, o	04
Mala?.....	05
Don't know / Not sure	77
Refused.....	99

→ SKIP to Q11

10. ¿Usa usted anteojos o lentes de contacto... (READ each use of glasses or contact lenses)

.....	<u>Yes</u>	<u>No</u>	<u>DK</u>	<u>Refused</u>
a. ...para ver cosas de cerca, como coser o leer?	01	02	77	99
b. ... para ver cosas a una distancia intermedia, como una computadora, o verse en el espejo?	01	02	77	99
c. ... para ver cosas más distantes, como cuando maneja o mira la televisión?.....	01	02	77	99

11. ¿Le ha dicho alguna vez un proveedor de atención de la vista que tiene una condición o enfermedad de los ojos?

Yes	01
No	02
Don't know / Not sure	77
Refused	99

12. ¿Le ha dicho alguna vez un proveedor de atención de la vista que tiene...?: (READ each eye disease/condition)(IF “YES” GO TO Q13; IF “NO” TO ALL CONDITIONS SKIP TO Q14)

RANDOMIZE ORDER

.....	<u>Yes</u>	<u>No</u>	<u>DK</u>	<u>Refused</u>
a. Ambliopía (am-blee-o-pee-ah) u “ojo vago” donde un ojo es más fuerte que el otro?	01	02	77	99
b. Cataratas—una opacidad de la lente del ojo?	01	02	77	99
c. Retinopatía diabética o enfermedad diabética del ojo?— una complicación de la diabetes que afecta su visión	01	02	77	99
d. Glaucoma? —una enfermedad que daña el nervio óptico y causa la pérdida de la visión del lado (o de la visión periférica) (IF NO, GOTO 12e. IF YES SKIP TO 12f)	01	02	77	99
e. Sospecha de glaucoma – le han dicho alguna vez que tiene alta presión ocular o un aspecto inusual del nervio óptico?	01	02	77	99
f. Degeneración macular relacionada con la edad—una enfermedad de los ojos que afecta a personas mayores y causa la pérdida de la visión central o hacia delante?	01	02	77	99
g. Miopía—dificultad para ver cosas que están lejos?	01	02	77	99
h. Presbiopía?— dificultad para ver cosas que están cerca [también conocida como hiperopía]	01	02	77	99
i. ¿Alguna otra condición o enfermedad de los ojos? (SPECIFY)_____	01	02	77	99

13. ¿Está recibiendo usted atención de seguimiento o tratamiento para [INSERT “YES” response from Q12 above]? Esto incluye exámenes regulares de los ojos y la obtención de anteojos o lentes de contacto.

.....	<u>Yes</u>	<u>No</u>	<u>DK</u>	<u>Refused</u>
a. Ambliopía (am-blee-o-pee-ah) or “ojo vago”	01	02	77	99
b. Cataratas	01	02	77	99
c. Retinopatía diabética.....	01	02	77	99
d. Glaucoma	01	02	77	99
e. Sospecha de glaucoma.....	01	02	77	99
f. Degeneración macular	01	02	77	99
g. Miopía	01	02	77	99
h. Presbiopía	01	02	77	99
i. Other(s) (SPECIFY)_____	01	02	77	99

14. ¿Alguna vez ha tenido una lesión o trauma en el ojo que requiriera la atención de un médico en la sala de emergencias o un consultorio médico?

Yes.....	01	➔(GO TO Q15)
No.....	02	➔(GO TO Q18)
Don't know / Not sure.....	77	➔(GO TO Q18)
Refused.....	99	➔(GO TO Q18)

15. Sobre la última lesión o trauma que pueda recordar, ¿cómo se produjo? **(DO NOT READ) (PROBE WITH LIST IF NECESSARY) [SELECT ALL THAT APPLY] [MUL=7]**

- 01. Practicando deportes/ actividad recreativa
- 02. Trabajando en un hobby (pasatiempo)
- 03. En su empleo, en el lugar de trabajo
- 04. En un automóvil
- 05. Al practicar jardinería/ cuidado del jardín
- 06. En el hogar
- 07. Other(s) **(SPECIFY)**.....
- 77. Don't remember/don't know/unsure
- 99. Refused

16. ¿Ha experimentado un cambio permanente en su visión o pérdida permanente de la visión debido a esta lesión o trauma?

- Yes.....01
- No.....02
- Don't know / Not sure.....77
- Refused.....99

17. ¿Tuvo que permanecer en un hospital durante la noche o por más tiempo debido a esta lesión o trauma?

- Yes01
- No02
- Don't know / Not sure.....77
- Refused.....99

III. Eye Examinations: Experiences and Attitudes

Las siguientes preguntas se refieren a exámenes de los ojos.

18. ¿Alguna vez examinó sus ojos un proveedor de atención de la vista? Esto incluye a su proveedor de atención primaria (médico primario) al igual que proveedores de atención de la vista.

- Yes 01 → **(GO TO Q19)**
- No 02 → **(GO TO Q23)**
- Don't know / Not sure 77 → **(GO TO Q23)**
- Refused.....99 → **(GO TO Q23)**

19. ¿Le dilataron las pupilas—o sea, le colocaron gotas en los ojos que pueden haberle causado visión borrosa o sensibilidad a la luz?

- Yes01
- No02
- Don't know / Not sure 77
- Refused.....99

20. Regularmente, cuando le examinan los ojos, ¿quién lo hace? Por favor no incluya la toma de medidas para hacerse anteojos o lentes de contacto. Es...

Un proveedor de atención de la vista (oculista, optómetra u oftalmólogo).	01
Su proveedor de atención primaria, o	02
Alguien más (SPECIFY)	03
DON'T Don't know / Not sure	77
READ→ Refused	99

21. ¿Cuándo se hizo por última vez un examen de los ojos por un proveedor atención de la vista como un oftalmólogo o un optometrista? (**DO NOT READ**) (**PROBE ONLY IF NECESSARY BY READING RANGES**)

Dentro del último mes (en cualquier momento hace menos de 1 mes)	01	→(GO TO Q22)
Dentro del último año (hace más de 1 mes pero menos de 12 meses)	02	→(GO TO Q22)
Dentro de los últimos 2 años (hace más de 1 año pero menos de 2 años)	03	→(GO TO Q22)
Hace 2 o más años	04	→(GO TO Q22)
DON'T Never	05	→(SKIP TO Q23)
READ→ Don't know / Not sure	77	→(SKIP TO Q24)
Refused	99	→(SKIP TO Q24)

22. ¿Cuál fue la razón **PRINCIPAL** por la cual la vez pasada se hizo examinar los ojos por un proveedor de atención de la vista? (**DO NOT READ.**)

Para un chequeo regular	01
Necesitaba nuevos anteojos o lentes de contacto	02
Tenía dificultad para ver	03
Tenía dolor en los ojos	04
Tenía dolores de cabeza	05
Tenía una infección o lesión en los ojos, o una enfermedad ocular	06
Recibió un aviso de su proveedor de atención de la vista para hacerse un examen regular de los ojos	07
Un familiar o amigo le sugirió que fuera	08
Fue enviado por otro proveedor de atención médica	09
Some other reason (SPECIFY)	11
Don't know / Not sure	77
Refused	99

→ **SKIP to Q24**

23. ¿Existe una razón en particular o **PRINCIPAL** por la cual usted nunca se hizo examinar los ojos por un proveedor de atención de la vista? (**DO NOT READ**)

Nunca he tenido problemas y no he tenido la necesidad de someterme a un examen de los ojos	01
Mi proveedor de atención primaria no me ha dicho que me someta a un examen de los ojos	02
He tenido otros problemas médicos más importantes	03
Me arreglo bastante bien con mi problema de los ojos	04
No me gustan los médicos y los evito	05
No quiero saber si algo está mal	06
El examen podría ser doloroso	07
Perdería tiempo de mi trabajo	08
El examen cuesta demasiado	09
La transportación es un problema	10
No estoy cubierto por un seguro médico	11
No puedo encontrar un proveedor de atención de la vista que hable mi idioma	12
No hay lugares o médicos lo suficientemente cerca de donde vivo o trabajo	13
No estoy seguro de dónde ir para hacerme a un examen de los ojos	14
No tengo tiempo, nunca pude resolverlo	15
Nunca lo pensé	16
Other (SPECIFY).....	17
Don't know / Not sure	77
Refused	99

24. Diferentes tipos de personas pueden ayudar a otros a cuidar mejor de su salud. Voy a preguntarle lo que usted haría si las siguientes personas dijeran que usted debe hacerse un examen de los ojos. Para cada uno, por favor dígame si sería muy probable, algo probable o improbable que usted se someta a un examen de los ojos.

Si **[INSERT a., b., c., d., e., and f. below]** dijera que usted necesita hacerse examinar los ojos, sería muy probable, algo probable o improbable que usted se sometiera a un examen de los ojos?

<u>RANDOMIZE ORDER</u>	Very <u>Likely</u>	Somewhat <u>Likely</u>	Not <u>Likely at all</u>	Don't know/ <u>Depends</u>	<u>Refused</u>
g. Familiares	01	02	03	77	99
h. Su proveedor de atención médica primaria ..	01	02	03	77	99
i. Su farmacéutico	01	02	03	77	99
j. Sus amigos	01	02	03	77	99
k. Compañeros de trabajo/ empleador (jefe)....	01	02	03	77	99
l. Líder religioso	01	02	03	77	99

IV. Knowledge About Eye Disease

Las siguientes preguntas se refieren a las enfermedades de los ojos.

25. ¿Alguna vez ha escuchado acerca del glaucoma?

Yes	01	→ (GO TO Q26)
No	02	→ (GO TO Q27)
Don't know / Not sure	77	→ (GO TO Q27)
Refused	99	→ (GO TO Q27)

26. Voy a leerle algunas declaraciones sobre el glaucoma. Por favor dígame si piensa que la declaración es cierta o falsa. Si no está seguro, por favor dígame. **(REPEAT "true, false, not sure" AS NECESSARY.)**

RANDOMIZE ORDER

	<u>True</u>	<u>False</u>	<u>Not Sure</u>	<u>Refused</u>
e. El glaucoma puede causar pérdida de la visión. ¿Es esto cierto, falso o no está seguro?	01	02	77	99
f. Existen síntomas tempranos de aviso para el				
g. glaucoma – cierto o, falso o no está seguro?	01	02	77	99
h. La pérdida de la visión por el glaucoma puede prevenirse	01	02	77	99
i. El glaucoma puede tratarse	01	02	77	99

27. ¿Alguna vez ha escuchado acerca de la degeneración macular relacionada con la edad?

Yes	01	→ (GO TO Q28)
No	02	→ (GO TO Q29)
Don't know / Not sure	77	→ (GO TO Q29)
Refused	99	→ (GO TO Q29)

28. Voy a leerle algunas declaraciones sobre degeneración macular relacionada con la edad. Por favor dígame si piensa que la declaración es cierta o falsa. Si no está seguro, por favor dígame. **(REPEAT "true, false, not sure" AS NECESSARY.)**

RANDOMIZE ORDER

	<u>True</u>	<u>False</u>	<u>Not Sure</u>	<u>Refused</u>
e. Las vitaminas y el zinc pueden ayudar a evitar la pérdida de la visión por degeneración macular en algunas personas. ¿Es esto cierto, falso o no está seguro?	01	02	77	99
f. La generación macular generalmente corre en las familias (es hereditaria), falso o no está seguro? ...	01	02	77	99
g. ¿Puede una persona tener degeneración macular y no saberlo?	01	02	77	99
h. ¿Puede la degeneración macular causar la pérdida de la visión central?	01	02	77	99

29. ¿Alguna vez ha escuchado acerca de la enfermedad diabética del ojo como la retinopatía diabética?

- Yes01 → (GO TO Q30)
- No02 → (GO TO Q31)
- Don't know / Not sure77 → (GO TO Q31)
- Refused99 → (GO TO Q31)

30. Voy a leerle algunas declaraciones sobre diabetes y la enfermedad diabética del ojo. De nuevo, me gustaría que me diga si piensa que la declaración es cierta o falsa. Si no está seguro, por favor dígame.

RANDOMIZE ORDER

	<u>True</u>	<u>False</u>	<u>Not Sure</u>	<u>Refused</u>
a. Las personas con diabetes tienen mayor riesgo de tener una enfermedad de los ojos que las que no tienen diabetes. ¿Es esto cierto, falso o no está seguro?01		02	77	99
b. La enfermedad de los ojos causada por la diabetes generalmente tiene síntomas tempranos de aviso01		02	77	99
c. La pérdida de la visión causada por la diabetes puede prevenirse01		02	77	99
d. Las personas con diabetes deben hacerse un examen de los ojos con dilatación al menos una vez por año.01		02	77	99
e. La enfermedad de los ojos causada por la diabetes no puede tratarse.....01		02	77	99

Ahora voy a hacerle algunas preguntas acerca de la baja visión.

31. ¿Alguna vez a escuchado el término "baja visión"?

- Yes01
- No02
- Don't know / Not sure77
- Refused99

32. Baja visión quiere decir que la vista de una persona no se corrige con anteojos, lentes de contacto, medicamentos o cirugía. La persona tiene dificultad para realizar las actividades diarias. ¿Alguna vez le ha dicho un proveedor de atención de la vista que tiene baja visión?

- Yes01 → (GO TO Q33)
- No02 → (GO TO Q36)
- Don't know / Not sure77 → (GO TO Q36)
- Refused99 → (GO TO Q36)

33. ¿Alguna vez le recomendó su proveedor de atención de la vista que viera a un especialista en baja visión? Un especialista en baja visión es un oftalmólogo u optometrista que ha recibido capacitación especial para la evaluación de baja visión. Esta persona puede recetar dispositivos (o aparatos) visuales y enseñarle a las personas cómo usarlos.

- Yes01 → (GO TO Q34)
- No02 → (GO TO Q36)
- Don't know / Not sure77 → (GO TO Q36)
- Refused99 → (GO TO Q36)

34. ¿Ha visto a un especialista en baja visión?

- Yes01 → (GO TO Q36)
- No02 → (GO TO Q35)
- Don't know / Not sure77 → (GO TO Q36)
- Refused99 → (GO TO Q36)

35.Cuál fue la razón principal para que no viera a un especialista en baja visión? (DO NOT READ) (PROBE IF NECESSARY)

- No he tenido ningún problema y no he sentido la necesidad de ver a un especialista01
- He tenido otros problemas médicos más importantes.....02
- Me arreglo bastante bien con mi problema de los ojos03
- No me gustan los médicos y los evito.....04
- No quiero saber si algo está mal05
- Puede ser doloroso06
- Perdería tiempo de mi trabajo07
- La transportación es un problema08
- No estoy cubierto por un seguro médico09
- El especialista en baja visión no habla mi idioma..... 10
- No hay lugares o médicos lo suficientemente cerca de donde vivo o trabajo 11
- No tengo tiempo, nunca pude resolverlo 12
- Other (SPECIFY) _____ 13
- Don't know / Not sure77
- Refused99

Ahora hablemos sobre los dispositivos (aparatos) visuales que pueden usarse en sus actividades diarias.

36. ¿Usa actualmente algún tipo de dispositivo/s o aparato/s visual/es para baja visión tal como una lupa o un telescopio?

- Yes01 → (GO TO Q37)
- No02 → (GO TO Q39)
- Don't know / Not sure77 → (GO TO Q39)
- Refused99 → (GO TO Q39)

37. ¿Recibió instrucciones acerca de cómo usar (este/estos) dispositivo(s) o aparatos(s)?

- Yes.....01
- No02
- Don't know / Not sure.....77
- Refused99

38. ¿Cuán importante diría usted que el/los dispositivo/s (aparatos) es/son en sus actividades diarias?

- Muy importante.....01
- Algo importante02
- No demasiado importante.....03
- No es importante en absoluto.....04
- Don't know / Not sure.....77
- Refused99

39. ¿Ha utilizado alguno de los siguientes dispositivos (o aparatos) de ayuda debido a problemas con su visión? **(READ EACH OF THE ASSISTIVE DEVICES)**

RANDOMIZE ORDER (a-f)

	<u>Yes</u>	<u>No</u>	<u>DK</u>	<u>Refused</u>
.....				
a. Materiales impresos con letras grandes	01	02	77	99
b. Libros que hablan.....	01	02	77	99
c. Otros artículos que hablan (como relojes, relojes pulsera, calculadoras)	01	02	77	99
d. Un bastón blanco (como a menudo usan las personas ciegas o con deterioro de la vista)	01	02	77	99
e. Una computadora adaptada con una pantalla con letras grandes o salida de voz	01	02	77	99
f. Un perro guía	01	02	77	99
g. Uso algún otro dispositivo (aparato) por problemas en su visión (SPECIFY) _____	01	02	77	99

40. En general, cuán importante diría usted que el/los dispositivo/s (aparatos) es/son en sus actividades diarias?

- Muy importante.....01
- Algo importante02
- No muy importante.....03
- No es importante en absoluto.....04
- Don't know / Not sure.....77
- Refused99

V. Information Sources

Las siguientes preguntas se refieren a fuentes de información de salud.

41. Durante los últimos 12 meses, dónde ha visto o escuchado algo acerca de la salud o las enfermedades de los ojos? (**DO NOT READ.**) (**PROBE IF ANSWER GIVEN: ¿Dónde más ha visto o escuchado algo acerca de la salud o las enfermedades de los ojos?**) (**SELECT ALL THAT APPLY.**) [MUL=13]

Revistas o boletines de noticias.....	01
Periódicos diarios o semanales	02
Panfletos o folletos educativos	03
Farmacia o supermercado	04
Programas o comerciales de televisión	05
Programas o comerciales de radio	06
Organizaciones religiosas o sociales a las cuales pertenece.....	07
En el Internet.....	08
En el consultorio de un médico, clínica o evaluación de salud en la comunidad	09
En su oficina o lugar de trabajo	10
De familiares y amigos.....	11
De una línea de información sobre salud	12
Other (SPECIFY).....	13
Haven't seen/heard anything about eye health or disease	14
Don't know / Not sure	77
Refused	99

42. Ahora le preguntaré sobre las personas con las que pueda haber hablado acerca de la salud o de las enfermedades de los ojos. En los últimos 12 meses, ha hablado sobre la salud o enfermedad de los ojos con _____?

RANDOMIZE ORDER (a-e)	<u>Yes</u>	<u>No</u>	<u>DK</u>	<u>Refused</u>
a. Un proveedor de atención médica que no es un proveedor de atención de la vista (oculista)?	01	02	77	99
b. Un farmacéutico?	01	02	77	99
c. Un familiar o amigo?	01	02	77	99
d. Un proveedor de atención de la vista (oculista)	01	02	77	99
e. Un compañero de trabajo/ empleador o jefe?	01	02	77	99
f. Cualquier otra persona? (SPECIFY).....	01	02	77	99

VI. Insurance

Deseo hacerle algunas preguntas acerca del seguro de salud

43. ¿Tiene usted algún tipo de cobertura de atención médica, incluyendo seguro de salud, planes prepagados como HMO, o planes del gobierno como Medicare?
- Yes 01 →(GO TO Q44)
No 02 →(GO TO Q48)
Don't know / Not sure 77 →(GO TO Q48)
Refused 99 →(GO TO Q48)
44. ¿Qué tipo de cobertura de atención médica tiene? **(READ RESPONSE OPTIONS.) (SELECT ALL THAT APPLY.) [MUL=5]**
- Medicare 01
Medicaid 02
Seguro de salud militar (como TRICARE o VA) 03
Seguro privado (incluso HMO [Organización para el Mantenimiento de la Salud], y PPO [Organización de Proveedores Preferidos]... .. 04
Otro (SPECIFY) _____ 05
Don't know / Not sure 77
Refused 99
45. ¿Cuánto del costo de un examen regular de los ojos proporcionado por un proveedor de atención de la vista está cubierto por su cobertura de atención médica (y/o seguro de visión, si lo tiene)? **[NOTE: el seguro de visión a veces está incluido en su cobertura de atención médica y otras veces puede ser un seguro adicional que cubre el costo de exámenes de los ojos, anteojos, lentes de contacto, y otros dispositivos (aparatos) visuales.]**
(TRAINING NOTE: THE FOLLOWING COULD BE AN UNREAD RESPONSE - PART OR ALL OF THE COST COVERED)
- Todo 01
Parte 02
Nada 03
Don't know / Not sure 77
Refused 99
46. ¿Su cobertura de atención médica (y/o seguro de visión, si lo tiene) paga por alguna parte del costo de anteojos o lentes de contacto?
- Yes 01
No 02
Don't know / Not sure 77
Refused 99

47. ¿Su cobertura de atención médica (y/o seguro de visión, si lo tiene) paga por alguna parte de dispositivos (aparatos) visuales que estén recetados por un profesional de atención de la vista como lupas, telescopios, escáners ópticos y circuitos cerrados de televisión?

Yes	01
No	02
Don't know / Not sure	77
Refused	99

Las últimas preguntas son para ayudarnos a entender mejor a las personas que responden esta encuesta. Sus respuestas se mantendrán completamente confidenciales.

VII. Demographic

48. ¿Cuál es el último grado escolar que completó? **(PROBE IF NECESSARY BY READING RESPONSES)**

Parte de escuela secundaria (no completada) o menos	01
Diploma de escuela secundaria o equivalente	02
Algo de universidad, pero menos que un título de 4 años	03
Título universitario de cuatro años completado	04
Postgrado comenzado o completado	05
DON'T	
READ- ▶ Don't know / Not sure	77
Refused	99

49. ¿Actualmente está:

Casado(a) ¿	01
Divorciado(a) o separado(a)?	02
Viudo(a)?, o	03
Soltero(a)? (nunca se ha casado)	04
Don't know / Not sure	77
Refused	99

50. ¿Contándolo a usted, cuántos adultos y niños actualmente viven en su hogar?

Don't know	77
Refused	99

51a. ¿Podría decirme al edad que cumplió en su último cumpleaños?

Don't know	77
Refused	99

51b. ¿Cuál de las siguientes categorías representa mejor la edad que cumplió en su último cumpleaños?
[READ]

Menor de 25	01
25-34.....	02
35-44.....	03
45-54.....	04
55-64	05
65-74	06
75 años o más.....	07
Refused	99

52. ¿Es usted de origen o ascendencia hispana?

Yes	01
No	02
Don't know	77
Refused	99

53. ¿Cuál o cuáles de las siguientes describe mejor su raza? **[Read list and choose all that apply]**
[MUL=6]

Indio americano o nativo de Alaska	01
Asiático	02
Nativo de Hawai y de otra isla del Pacífico	03
Negro o afroamericano	04
Caucásico (blanco)	05
Otro (specify _____)	06
Don't know	77
Refused	99

54. Finalmente, deseo leerle una serie de grupos de ingresos. Por favor, deténgame cuando lea el grupo que describe el **INGRESO TOTAL DE SU HOGAR ANTES DE IMPUESTOS EN EL 2004.**
(PROBE, IF NECESSARY, BY READING RANGES:)

(READ IF NECESSARY: Los ingresos son importantes para analizar la información de salud que recopilamos. Por ejemplo, esta información nos ayuda a saber si las **personas en un grupo de ingresos usan ciertos tipos de servicios de atención médica con mayor o menor frecuencia que aquellos en otros grupos.)**

Menos de \$10,000	01
\$10,000 a \$14,999	02
\$15,000 a \$24,999	03
\$25,000 a \$34,999	04
\$35,000 a \$49,999	05
\$50,000 a \$74,999	06
\$75,000 a \$99,999	07
\$100,000 a \$149,999	08
\$150,000 a \$199,999	09
\$200,000 o más	10
DON'T READ → Don't know	77
Refused	99

55. **[READ ONLY IF NECESSARY]** Una última pregunta... con fines de clasificación de sus respuestas, por favor dígame su sexo.
- | | |
|---------------|----|
| Male | 01 |
| Female | 02 |
| Refused | 99 |

GRACIAS POR SU TIEMPO. APRECIAMOS MUCHO SU AYUDA.
A STATE CODE GEORGRAPHIC SIZE CODE (E.G., URBAN SUBURBAN, RUAL) WILL BE ADDED, AFTER INTERVIEWING, BASED ON SAMPLE FILE.

APPENDIX B

Survey Methodology

SURVEY METHODOLOGY

The 2005 Knowledge, Attitudes, and Practices (KAP) Study was conducted nationwide and consisted of a randomly selected base sample of 2,400 adults aged 18 and older and a supplemental sample of 200 Asian adults aged 18 and older. The Asian oversample survey was designed to support more precise estimates for Asian populations in the United States because a base survey can generate valid estimates for the overall adult population residing in the United States, but it cannot produce valid estimates for the Asian subpopulation of the United States.

Telephone interviews were conducted in English and in Spanish with randomly selected adults, aged 18 and older, from randomly sampled households of all landline telephone-equipped housing units (HUs) in the United States. The survey questions gathered a variety of opinions and information about KAP related to eye health and eye disease.

The following section details the sampling procedures performed for the study.

A. Sampling

The 2005 KAP survey sample was drawn from the total noninstitutionalized U.S. adult population, aged 18 and older, residing in landline telephone-equipped HUs. This population excludes those with the following characteristics:

- (1) Living in institutional and noninstitutional group quarters:
 - a. Penal, mental, hospital, or other institutions
 - b. Other group quarters such as dormitories, barracks, convents, nursing homes, group homes, or boarding houses (with 10 or more unrelated residents)
- (2) Living at a second HU for fewer than 30 days
- (3) Living in an HU without a telephone
- (4) Having inadequate English- or Spanish-language skills to complete the interview
- (5) Having physical or mental impairments that prevented them from completing an interview (as identified by the interviewer or by another member of the household).

Base Sample

The base sample for the 2005 KAP survey called for a disproportionate, stratified, statewide, random sample of telephone-equipped HUs in the United States, with a minimum of 2,400 interviews during the interviewing period. The sample was selected using random-digit dialing (RDD), which ensures that the sample represents all U.S. households with landline telephone numbers, including those published in telephone directories and those that are unlisted. Based on the telephone exchange dialed, each completed interview was coded for state, geographic region, and type of location (i.e., urban, suburban, or rural).¹ Telephone interviews were completed in all 50 states and the District of Columbia.

Sampling Frame

To generate the stratified RDD samples, an up-to-date list of all current operating telephone exchanges (three-digit prefixes) in the United States was prepared. These telephone exchanges, when combined with all four-digit numbers from 0000 to 9999, constituted the set of all possible working U.S. telephone numbers, both residential and nonresidential.

This set of all possible telephone numbers was then arranged in ascending order by exchange and suffix, and divided into blocks of 100 numbers each (100-blocks). Cross-reference directories determined which of these blocks contained at least one listed residential number. Blocks with at least one listed residential number are known as 1+ blocks, and blocks without a listed residential number are known as zero-blocks. Zero-blocks consist of the set of all 100-blocks that may contain residential numbers, but did not contain at least one listed number. To greatly enhance efficiency (and reduce costs), zero-blocks were excluded from the sampling frame.

The exclusion of zero-blocks reduces the frame coverage but considerably increases productivity. Nationally, only about 3.5% of residential numbers are in zero-blocks (Tucker, Lepkowski, & Piekarski, 2002) and excluding them does not result in any significant bias (Brick, Waksberg, Kulp, & Starer, 1995). The

¹ The Genesys sampling system was used to generate the list of random telephone numbers. Genesys assigns telephone exchanges based on the plurality of listed households and includes the following classification: 1=center of a metropolitan statistical area (MSA); 2=outside center city, but inside county containing center city; 3=inside a suburban county of the MSA; 4=in an MSA with no center city; and 5=not an MSA. These Genesys exchange classifications were applied to each telephone number in the sample. The following Metro Status Code was applied for each record in the data: 1=urban, 2–4=suburban, 5=rural.

remaining 100-blocks, those with at least one listed residential number (or 1+ blocks) comprise the sampling frame, referred to as a *truncated list-assisted* frame because listed telephone numbers help in improving sampling efficiency. All possible telephone numbers, both listed and unlisted, in 1+ blocks are eligible for selection using RDD.

Sample Selection

The sample was selected using a density-stratified approach. By using a telephone number directory listing status (i.e., listed or unlisted), numbers can be classified into a high-density stratum (listed numbers) and a low-density stratum (unlisted numbers), where density refers to the percentage of telephone numbers that ring into a residential unit. This sampling procedure involves two phases—

Phase 1: An initial RDD sample of telephone numbers is drawn from the frame (as described above). The resulting Phase 1 sample of numbers is then matched to a database of directory-listed telephone numbers to determine whether the phone number is listed or unlisted. Those listed are stratified into the high-density stratum and those unlisted into the low-density stratum.

Phase 2: To increase the density of the Phase 2 sample, all Phase 1 telephone numbers from the high-density stratum are retained in the Phase 2 sample, while only a subsample are retained from the low-density stratum. The sampling ratio of high-density numbers relative to low-density numbers is 1.5:1.

Asian Oversample

The Asian oversample was selected in the same manner as the base sample, but was restricted to telephone exchanges associated with geographic areas with high proportions of Asians (at least 70% of the population classified themselves as Asian).² The goal was to obtain a minimum of 200 interviews from respondents who indicated they were Asian.

² Restricting telephone exchanges to special geographic areas results in a bias toward urban areas similar to what one would find in other telephone surveys.

B. Questionnaire Development and Design

The KAP survey collects information about knowledge, attitudes, and practices related to eye health and eye disease among the adult population of the United States. The base and Asian oversample study used the same survey instrument.

The 2005 KAP survey consisted of the following seven sections:

1. General Health
2. Eye Health
3. Eye Examinations: Experiences and Attitudes
4. Knowledge About Eye Disease
5. Information Sources
6. Insurance
7. Demographic Information

The National Eye Institute (NEI) and the Lions Clubs International Foundation (LCIF) formed a work group composed of nationally recognized eye health professionals, survey methodologists, and statisticians to review the 1991 KAP Study, consider the overall purpose of the 2005 KAP Study, and recommend modifications to the 1991 KAP survey instrument. The work group decided to keep the same seven sections of the survey (see list above); delete items that were never reported in 1991; and add new items related to age-related macular degeneration, eye injury, low vision, and visual devices, while maintaining the core questionnaire. This process permitted limited comparability to data collected in 1991 and other national surveys such as the National Health and Nutrition Examination Survey and the National Health Interview Survey.

Cognitive interviews were conducted with a sample of respondents to test the full survey, in general, and the new questions, in particular.³ The goal was to evaluate user acceptance and assess internal validity or cognitive understanding of the additional questions to determine if respondents interpreted these questions and the responses as they were intended in the design. Cognitive interview recruiting began on September 19, 2005. Of the 15 respondents recruited using RDD for cognitive interviews, eight respondents participated.

³ Cognitive interviewing is a technique used to ascertain a respondent's understanding of survey questions and the response categories.

The cognitive testing was conducted between September 26 and 30, 2005, and involved asking all survey questions as well as follow-up qualitative questions to assess respondent cognition. All respondents who participated in the cognitive interviews received monetary compensation for their time.

Upon completion of the cognitive interviews, a summary document with results was prepared. The document provided details from each interview where wording changes were recommended or where respondents had particular difficulty. A small work group, drawn from the larger KAP work group, evaluated the results and comments from the cognitive interviews and determined the final survey content and wording. The final version of the questionnaire contained 124 items. For each respondent, there were several survey items that were asked in randomized order to avoid biasing the results. Specifically, these questions were: Q5; Q12; Q24; Q26; Q28; Q30; Q39; and Q42. To view the questionnaire, see Appendix A: Final 2005 KAP Survey.

The 2005 KAP survey was offered in English and Spanish. To prepare the Spanish versions of the survey, the final English questionnaire was submitted to a translation agency. The translation process involved two steps: (1) translation of the English survey into Spanish (conducted by a translation agency), and (2) translation verification of the Spanish survey (conducted by an expert Spanish translator who has worked extensively in the field of vision research). In cases where the original meaning of the question was diluted or particular wording was significantly changed through the translation process, the Spanish translator recommended modifications to achieve the appropriate translation. As with the English version of the survey, the translated document was submitted to LCIF for final approval before fielding Spanish interviews. The Spanish 2005 KAP survey follows the English survey in Appendix A.

C. Institutional Review Board

The Federal government requires all organizations receiving Federal funds and conducting research involving human subjects to ensure the protection of those subjects from unnecessary risks of harm. Federal regulations on human subjects' protections require that most research involving human subjects be reviewed and approved by an Institutional Review Board (IRB). The draft 2005 KAP survey instruments, as well as the final surveys, were reviewed by the Macro International Inc. (Macro) IRB and approved on September 1, 2005.

D. Interviewer Training

Quality data collection depends largely on the performance of the interviewing staff. Interviewers for this study were specifically recruited for health care research and several were able to conduct interviews in both English and Spanish. A description of interviewers' qualifications for this survey can be found in Appendix D: Qualifications of Interviewers. The 2005 KAP training sessions focused on four important aspects of the survey research process—

- 1) **Introduction to the Survey.** The first part of the training introduced the interviewers to the purpose and scope of the survey. This part of the training included an explanation of the importance of a high response rate, the effect that a high number of refusals has on the study, who NEI and LCIF are, the purpose of this study, any terminology specific to the project, and the importance of confidentiality. (All study employees sign a statement of confidentiality on the date of hire. A copy of the confidentiality statement can be found in Appendix E: Confidentiality Agreement.)
- 2) **Review of the Questionnaire.** The second step in the training process was a review of the questionnaire, done interactively with the computer-assisted telephone interviewing (CATI) program. Each interviewer worked on a terminal and completed each screen of the CATI program. Many different scenarios, such as respondent reactions, skip-pattern scenarios, and refusals gave the interviewer a better understanding of the CATI program and the questionnaire.
- 3) **Probing Techniques.** The third step was a brief discussion on probing techniques. This section focused on keeping question nonresponse to a minimum and avoiding respondent refusals. Some probing techniques taught include the clarification of respondent responses and re-reading of response categories.
- 4) **Uncooperative Respondents.** The fourth part of the training dealt with handling uncooperative respondents, focusing on respondent refusal conversion. This part of the training introduced interviewers to many of the refusal statements that they might hear from potential respondents.

The manual that trainees received can be found in Appendix F: KAP Survey—Interviewer Training Manual.

E. Data Collection Protocol

A telephone interview approach was employed for data collection. This data collection protocol is consistent with the Behavioral Risk Factor Surveillance Study (BRFSS)—Centers for Disease Control and Prevention protocol.

Experienced, supervised personnel conducted the KAP interviews using the Computers for Marketing Corporation (CfMC) CATI software package.

Pretest

The survey instrument was pretested on October 19, 2005. This pretest was largely operational in scope and was intended to ensure that the CATI program functioned properly and that there were no cognitive issues related to any questions in the survey. Ten pretest interviews were completed in English with sample respondents. The pretest resulted in minor wording changes and additional interviewer prompts during the introduction, as well as a logic modification on Q11. Upon completion of the English survey instrument, the survey was translated into Spanish. Because of the scope of changes, the pretest data are not included in the final data.

Base

The first date of calling was October 20, 2005, and the last date of calling was January 11, 2006. The target was specified at 2,400 interviews, which was exceeded by 129 interviews. Table B-1 presents the total number of completed interviews (defined as someone who answered the last question in the survey) and the language in which the interview was conducted. Interviews averaged 17 minutes in length.

Table B-1: Base Number of Completed Interviews and Interview Length in Minutes

	Number of Completed Interviews	Survey Length in Minutes
All respondents	2,529	17 minutes
English	2,425	17 minutes
Spanish	104	18 minutes

Asian Oversample

The first date of calling was October 20, 2005, and the last date of calling was January 11, 2006. The target was specified at 200 interviews, which was exceeded by 72 Asian interviews and another 379 non-Asian interviews that were obtained as a result of conducting the Asian oversample. Ninety-eight

percent (98%) of the interviews with respondents who self-identified as Asian were conducted in English and the remaining 2% in Spanish. Table B-2 presents the total number of completes and the language in which the interviews were conducted. Interviews averaged 17 minutes in length.

Table B-2: Asian Oversample Number of Completed Interviews and Interview Length in Minutes

	Number of Completed Interviews	Survey Length in Minutes
Asian Respondents	272	17 minutes
English	266	17 minutes
Spanish	6	17 minutes
Non-Asian Respondents	379	17 minutes
English	375	17 minutes
Spanish	4	18 minutes

F. Survey Implementation

This section describes in detail the telephone interview protocol that was used for the 2005 KAP survey. Data collection began in October 2005 using the BRFSS call protocol.

Respondent Selection

Each household contacted was listed to identify the total number of adults in that household. If there was more than one adult in the household, an adult was randomly selected for participation in the study. If that adult was unavailable during the survey period, was unable or unwilling to participate, or did not speak English or Spanish well enough to be interviewed, no interview was conducted. If a randomly sampled number yielded a business, an institution, group quarters, or other strictly nonresidential space, or if it was an occupant’s second residence and his or her stay was less than 30 days, no interview was conducted.

Treatment of No Answers

If a call to a sampled telephone number was not answered, the number was called repeatedly at different times, during daytime and evening hours (9 a.m. to 9 p.m., Monday to Friday; 10 a.m. to 9 p.m., Saturday; 1 p.m. to 9 p.m., Sunday), on different days of the week, in a pattern designed to maximize the likelihood of contact with a minimum number of calls. At least 15 contact attempts, over a

minimum 5-day period (typically 15 days), were made to reach a sampled number. Once any contact was made at a residence, as many calls as necessary were made to reach the randomly selected adult (within the permitted time schedule).

Converting Initial Refusals

The BRFSS refusal guidelines require two refusals by a selected respondent to terminate the record from calling. The refusal protocol for the 2005 KAP survey consisted of two refusals, by either a nonselected or a selected respondent, to terminate the record from calling.

Specially trained conversion interviewers contacted initial refusals at least 3 days later in an effort to persuade respondents to participate in the survey. The refusal conversion rate was 6.8% for the base study and 2.4% for the Asian oversample study.

Non-English Interviewing

The 2005 KAP survey was offered in one non-English language: Spanish. All records were first attempted in English, and if a household was identified as non-English-speaking, a Spanish-speaking interviewer made subsequent attempts on the record, as required.

Base

- 2,800 (96.3%) of the telephone interviews were conducted in English
- 108 (3.7%) of the telephone interviews were conducted in Spanish

Asian Oversample

- 266 (97.8%) of the telephone interviews were conducted in English
- 6 (2.2%) of the telephone interviews were conducted in Spanish

G. Data Collection Quality Control and Monitoring

Quality assurance reviews were conducted throughout the survey period to ensure the integrity of the data. These activities are a part of our standard protocol when conducting survey interviews and are described in further detail on the following pages.

Data Checks

The survey instrument was programmed to automatically control skip-and-fill logic and perform range checks for numeric data. The programming logic

directed the flow of the questionnaire and prevented an interviewer from entering the correct data in the wrong field. On any given screen of the questionnaire, the program only accepted a predetermined range or type of response. The program also required interviewers to confirm responses that conflicted with information previously entered, verifying data before survey completion.

Interviewing Quality Assurance

Interviews were monitored on a regular basis. Monitoring was conducted for completed interviews and many more noncompleted interviews, such as interviewers' attempts at refusal conversion, household selection, and selected-respondent contact. Monitoring forms were completed for each monitored interview. These forms rated interviewers in up to 15 areas of performance.

Use of Monitoring Results

Interviewers who score below a threshold figure are given supplemental training and future interviews are monitored more closely. If at any time a supervisor discovers that an interviewer has entered incorrect data, the supervisor records the question number and the respondent's correct response, and makes certain that the error is corrected at the end of the interview. The interviewer is then suspended from the study for further training, and his or her completed interviews are removed from the database. There were no instances of this during the data collection for this study.

H. Data Management

The 2005 KAP survey data were entered into a project database during interviewing using the CfMC CATI software package. The data were then converted into an ASCII file and later saved as Statistical Analysis System (SAS) and Statistical Package for the Social Sciences (SPSS) systems files. Each file was carefully constructed and reviewed to identify and clarify logically inconsistent responses.

Weighting Method

The weights for the 2005 KAP survey data were calculated in a multistage process. Preliminary weights were constructed to correct for differential probabilities of selection of both households and members within households. These preliminary weights were then post-stratified to 2000 U.S. Census population counts by geographical region, race, education, age, and gender, producing final weights for estimating population totals.

Before calculating weights, missing values were imputed for age (1.6%), sex (0.4%), race (1.2%), or education level (1.3%). These random imputations were based on the observed distribution of that particular demographic.

Base weights were calculated as the inverse of the probability of a particular phone number being selected for either the base sample or the Asian oversample. The probability of selection for a particular telephone number in either sample was the sum of the selection probabilities for each sample.

As a nonresponse adjustment for each sample, the number of completed interviews was ratio-adjusted up to the estimated number of eligible households in the sample. Base weights were used in the ratio adjustment. The nonresponse-adjusted base weights were calculated by multiplying the base weights by the ratio-adjustment factor.

To calculate person-selection weights, the nonresponse-adjusted base weights were then multiplied by the inverse of the adult's selection probability. Because each adult living in the household had an equal probability of being selected, this adjustment was equal to the number of adults in the household.

The base weights were then post-stratified to population totals by race, education, region, gender, and age group. Race was classified into six groups: Hispanic, Caucasian, Black or African American (referred to as Black from this point on), Asian, Pacific Islander, and Other. Education was classified into four groups: some high school (not completed) or less, high school diploma or GED, some college, and bachelor's degree or more. Regions were classified into four groups: South, North Central, West, and Northeast. Gender was crossed with six age groups: 18 to 24, 25 to 34, 35 to 44, 45 to 54, 55 to 64, and 65 and older. Population totals were based on the 2000 Census. Raking, or iterative proportional fitting, was used to match the sample distributions to population distributions. Appendix H contains standard errors for each of these weighting variables.

To decrease variability, weights were capped at the 98th percentile for non-Asian respondents, and the 80th percentile for Asian respondents. To maintain population levels, the sum of weights exceeding these values was redistributed evenly among all other records with smaller weights within each group.

Data Security

All data (hard copy and electronic) are stored at Macro headquarters. All research materials are properly filed, maintained, and secured in a locked file

cabinet. Electronic data are kept on a secure Macro file server, which is password-protected and stored in a secured location with restricted physical access. Disaggregate data will be destroyed after three years.

A public-use data file without personal identifiers was provided to NEI and LCIF at the conclusion of the project.

I. Data Analysis

Analysis of the 2005 KAP survey data was a three-stage process. First, preliminary frequency and percentage distributions were generated for each question and reviewed carefully for outliers and miscoded responses. Once this review was complete, the second stage of analysis summarized the data for each question by (1) all respondents (i.e., all adults aged 18 and older), (2) men and women respondents, (3) respondents who identified themselves as Caucasian, Black, Hispanic, and Asian, (4) respondents aged 18 to 39, 40 to 64, and 65 and older, (5) respondents with household incomes of less than \$15,000, \$15,000 to \$34,999, \$35,000 to \$74,999, and \$75,000 and more, (6) respondents with education levels of less than high school diploma, high school diploma, some college, and bachelor's degree or more, and (7) respondents' health care insurance status (having health insurance, prepaid plans such as HMOs, or government plans such as Medicare versus none). Point estimates for each question (and accompanying standard error information) are presented in the chapter, Findings. Summary data for each question are presented in Appendix I: Data Tables for Adults 18 Years and Older.

The final stage of data analysis was simple comparisons among subgroups. These comparisons were conducted using the key demographic variables discussed above (i.e., sex, race/ethnicity, age group, education level, household income level, and health care insurance status). Differences among subgroups for each of the demographic variables (e.g., men and women) were examined for each survey question using Pearson's chi-square test and results (i.e., the chi-square statistic and the significance level of the statistic) are presented in Chapter 3 of the report.

Pearson's chi-square test is the original and most widely used chi-square test on nominal variables. It is used to assess two types of comparisons: tests of goodness of fit and tests of independence. A test of goodness of fit establishes whether or not an observed frequency distribution differs from a theoretical distribution. A test of independence assesses whether paired observations on two variables, expressed as a contingency table, are independent of one

another—for example, whether people from different educational backgrounds differ in the frequency with which they report seeing an eye care professional sometime in the past two years.

Data from the 1991 KAP survey are also presented and compared with 2005 data in Chapters 2 to 6 of the report. Because the raw data for the 1991 KAP survey are unavailable for analysis, no statistical tests of the differences between 1991 and 2005 results could be performed.

J. Age Adjustment

To appropriately compare percentages of persons from different races and ethnicities reporting certain knowledge, attitudes, and perceptions regarding eye health and disease, those percentages must be age-adjusted so that any differences between groups reflect real differences and not simply differences associated with age. Age adjustment, using the direct method, is the application of observed age-specific rates to a standard age distribution to eliminate differences in crude rates in populations of interest that result from differences in the populations' age distributions (CDC, 2001).⁴ This adjustment is usually done when comparing two or more populations at one point in time or one population at two or more points in time. Age adjustment is particularly relevant when populations being compared have difference age structures, for example, U.S. White and Hispanic populations.

The process of deriving age adjustment weights for survey and other population-based data begins with identifying the age categories to be used for age adjustment and ensuring that all subgroups can be constructed from a single “master list.” The source of the master list is the official Bureau of the Census population projections for the year 2000 published in the Current Population reports, series P-25, number 1130, Table 2. The master list consists of 24 age groups. Those groups were used to construct the three age groups for the KAP survey data (see Tables B-3 and B-4).

⁴ Klein, R. J. & Schoenborn, C. A. (2001). Age adjustment using the 2000 projected U.S. population. Healthy People 2010 Statistical Notes. Bethesda, MD: National Center for Health Statistics.

Table B-3: Master List: 2000 U.S. Projected Population and Age-Adjustment Weights

Age	Population (in thousands)	Adjustment Weight
All ages	274,634	1.000000
Under 1 year	3,795	0.013818
1 year	3,759	0.013687
2-4 years	11,433	0.041630
5 years	3,896	0.014186
6-8 years	11,800	0.042966
9 years	4,224	0.015380
10-11 years	8,258	0.030069
12-14 years	11,799	0.042963
15-17 years	11,819	0.043035
18-19 years	8,001	0.029133
20-24 years	18,257	0.066478
25-29 years	17,722	0.064530
30-34 years	19,511	0.071044
35-39 years	22,180	0.080762
40-44 years	22,479	0.081851
45-49 years	19,806	0.072118
50-54 years	17,224	0.062716
55-59 years	13,307	0.048454
60-64 years	10,654	0.038793
65-69 years	9,410	0.034264
70-74 years	8,726	0.031773
75-79 years	7,415	0.027000
80-84 years	4,900	0.017842
85 years and over	4,259	0.015508

Table B-4: Age Distribution and Age-Adjustment Weights for KAP Survey Data (derived from Table 1)

Age	Population (in thousands)	Adjustment Weight
18 years and over	203,851	1.000000
18-39 years	85,671	0.420263
40-64 years	83,470	0.409466
65 years and over	34,710	0.170271

To illustrate this age-adjustment procedure, Table B-5 shows the age-unadjusted percentages (i.e., KAP survey estimate shown in column B) of adults (of different race, ethnicity, and age classifications shown in column A) responding to the question “In general, would you say your health is excellent, very good, good, fair, or poor?” (column B). Column C presents the age-adjustment weights shown in Table B-4 that were derived from the age-specific population frequencies shown in Table B-3. Column D presents the age-adjusted percentages for each race and ethnic group as the sum of the adjusted individual age estimates.

Table B-5: Example of Calculation of Age-Adjusted Percentage of Adults Reporting That Their Health Was Good, Very Good, or Excellent

A	B	C	D
Race/Ethnicity and Age	KAP Survey Estimate	Age Adjustment Factor	Age-Adjusted KAP Estimate
Hispanic 18+	74.9	1.000000	0.689261
18-39	83.1	0.420263	
40-64	65.7	0.409466	
65+	41.7	0.170271	
White 18+	85.2	1.000000	0.856913
18-39	92.1	0.420263	
40-64	84.1	0.409466	
65+	73.7	0.170271	
Black 18+	75.5	1.000000	0.752541
18-39	80.7	0.420263	
40-64	71.6	0.409466	
65+	70.6	0.170271	
Asian 18+	86.8	1.000000	0.864172
18-39	92.5	0.420263	
40-64	83.3	0.409466	
65+	78.9	0.170271	

K. Response Rates

Response rates provide a measure of interviewing success. There are a number of different ways to calculate survey response rates. The following summarizes the two ways that the response rates were calculated for the 2005 KAP Study. The Council of American Survey Research Organizations (CASRO) response rate measures the rate of completed interviews among eligible respondents. The number of eligible respondents is estimated as the sum of the known eligible records plus a proportion of records with unknown eligibility. The CASRO response rate for the 2005 KAP survey was 28.8% (base), 15.8% (Asian oversample), and 24.5% overall. The cooperation response rate measures the respondent's willingness to respond to the survey. It is equivalent to the number of completed interviews divided by the sum of all interview attempts, breakoffs, and refusals. The cooperation response rate for the 2005 KAP survey was 54.2% (base), 39.5% (Asian oversample), and 50.3% overall. Appendix G provides a summary of the nonresponse error analysis conducted for the 2005 KAP Study.

L. Future Research

Throughout this evaluation process, we encountered various issues concerning the introduction of the survey to respondents, response categories, timeframe for data collection, and the effect of wireless-only households. Discussion and recommendations surrounding these issues are presented in Appendix J: Issues for Consideration for Future Research.

References

- Brick, J. M., Waksberg, J., Kulp, D., & Starer, A. (1995). Bias in list-assisted telephone samples. *Public Opinion Quarterly*, 59(2), 218–235.
- Tucker, C., Lepkowski, J. M., & Piekarski, L. (2002). The current efficiency of list-assisted telephone sampling designs. *Public Opinion Quarterly*, 66(3), 321–338.

APPENDIX C

Survey Items Responses by Race/Ethnicity

When reading this table, please note the following:

The survey findings presented in this appendix are self-reported and were not clinically verified. Crude rates for everyone aged 18 years and older for Hispanic, Asian, Black, and Caucasian racial and ethnic groups are provided in a table format. Aggregating response percentages for the reported racial and ethnic groups may not equal 100% because only the percentages for these groups are presented. A small percentage of respondents who self-identified as American Indian, Alaska Native, or another race/ethnicity are excluded from this table.

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q1. In general, would you say your health is...					
Excellent	18% (16%-20%) N = 575	11% (6%-15%) N = 36	20% (11%-30%) N = 42	13% (7%-20%) N = 24	19% (17%-22%) N = 424
Very Good	36% (34%-38%) N = 1,068	18% (12%-24%) N = 47	31% (21%-42%) N = 95	35% (26%-44%) N = 56	39% (37%-42%) N = 791
Good	29% (27%-31%) N = 969	47% (39%-55%) N = 115	35% (25%-46%) N = 130	27% (19%-35%) N = 51	26% (24%-29%) N = 567
Fair	12% (10%-14%) N = 395	18% (12%-25%) N = 51	11% (3%-18%) N = 26	20% (12%-28%) N = 31	10% (8%-11%) N = 242
Poor	5% (4%-6%) N = 164	7% (3%-10%) N = 23	2% (0%-3%) N = 10	4% (1%-8%) N = 10	5% (4%-6%) N = 106
Don't Know	0% (0%-0%) N = 6	0% (0%-0%) N = 1	0% (0%-1%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Refused to answer	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 2
Q2. How long ago was the last time you saw a health care provider?					
Within the past month	41% (38%-43%) N = 1,383	35% (28%-43%) N = 110	28% (19%-38%) N = 117	42% (33%-51%) N = 75	42% (40%-45%) N = 960
Within the past year	46% (43%-48%) N = 1,441	43% (35%-51%) N = 118	57% (46%-68%) N = 146	45% (36%-54%) N = 81	46% (43%-48%) N = 960
Within the past 2 years	6% (5%-7%) N = 165	11% (6%-16%) N = 22	6% (1%-12%) N = 24	6% (1%-10%) N = 7	6% (4%-7%) N = 100
2 or more years ago	7% (6%-8%) N = 170	11% (5%-17%) N = 23	4% (0%-8%) N = 14	7% (2%-12%) N = 9	6% (5%-8%) N = 105
Never	0% (0%-0%) N = 7	0% (0%-0%) N = 0	2% (0%-6%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 2

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Don't Know	0% (0%-1%) N = 10	0% (0%-0%) N = 0	0% (0%-1%) N = 1	0% (0%-0%) N = 0	0% (0%-1%) N = 4
Refused	0% (0%-0%) N = 4	0% (0%-0%) N = 0	2% (0%-6%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 2
Q3a. Have you ever been told by a health care provider that you have diabetes?					
Yes	9% (8%-11%) N = 355	11% (6%-15%) N = 37	10% (3%-16%) N = 37	17% (11%-23%) N = 35	8% (7%-10%) N = 207
No	90% (89%-92%) N = 2,819	89% (85%-94%) N = 236	90% (84%-97%) N = 267	83% (77%-89%) N = 137	92% (90%-93%) N = 1,922
Don't Know	0% (0%-0%) N = 4	0% (0%-0%) N = 0	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 3
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q3b. Have you ever been told by a health care provider that you have high blood pressure?					
Yes	27% (25%-29%) N = 981	21% (15%-27%) N = 77	20% (12%-29%) N = 90	32% (24%-41%) N = 62	28% (25%-30%) N = 670
No	73% (71%-75%) N = 2,190	79% (73%-85%) N = 196	80% (71%-88%) N = 214	68% (59%-76%) N = 110	72% (70%-74%) N = 1,457
Don't Know	0% (0%-0%) N = 7	0% (0%-0%) N = 0	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 5
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q3c. Have you ever been told by a health care provider that you have heart disease?					
Yes	7% (6%-8%) N = 280	4% (2%-7%) N = 18	3% (0%-7%) N = 16	5% (2%-9%) N = 11	8% (7%-9%) N = 202
No	92% (91%-94%) N = 2,883	96% (93%-98%) N = 255	97% (93%-100%) N = 288	95% (91%-98%) N = 161	92% (90%-93%) N = 1,917
Don't Know	0% (0%-1%) N = 15	0% (0%-0%) N = 0	0% (0%-0%) N = 1	0% (0%-0%) N = 0	1% (0%-1%) N = 13
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q3d. Have you ever been told by a health care provider that you have arthritis?					
Yes	21% (19%-23%) N = 788	8% (5%-11%) N = 47	11% (5%-18%) N = 47	22% (14%-29%) N = 38	24% (21%-26%) N = 591
No	78% (77%-80%) N = 2,380	92% (89%-95%) N = 225	87% (80%-94%) N = 255	78% (71%-85%) N = 133	76% (74%-78%) N = 1,537
Don't Know	0% (0%-1%) N = 9	0% (0%-0%) N = 1	2% (0%-6%) N = 3	0% (0%-1%) N = 1	0% (0%-1%) N = 3
Refused	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 2
Q3e. Have you ever been told by a health care provider that you have cancer?					
Yes	6% (5%-7%) N = 250	3% (1%-6%) N = 16	1% (0%-3%) N = 9	5% (1%-8%) N = 9	7% (6%-8%) N = 191
No	94% (93%-95%) N = 2,921	96% (94%-99%) N = 256	98% (97%-99%) N = 293	95% (92%-99%) N = 163	93% (92%-94%) N = 1,939
Don't Know	0% (0%-0%) N = 7	0% (0%-0%) N = 1	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 2
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q4a. Have you ever been treated for diabetes?					
Yes	85% (80%-90%) N = 304	77% (57%-97%) N = 29	74% (40%-100%) N = 29	83% (68%-98%) N = 30	87% (82%-93%) N = 182
No	15% (10%-20%) N = 51	23% (3%-43%) N = 8	26% (0%-60%) N = 8	17% (2%-32%) N = 5	13% (7%-18%) N = 25
Q4b. Have you ever been treated for high blood pressure?					
Yes	82% (78%-86%) N = 850	64% (48%-81%) N = 60	83% (66%-100%) N = 79	82% (69%-95%) N = 54	85% (81%-88%) N = 593
No	18% (14%-22%) N = 129	36% (19%-52%) N = 17	17% (0%-34%) N = 11	18% (5%-31%) N = 8	15% (12%-19%) N = 77
Don't Know	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0
Q4c. Have you ever been treated for heart disease?					
Yes	86% (81%-91%) N = 239	78% (54%-100%) N = 15	32% (0%-70%) N = 12	84% (62%-100%) N = 9	90% (86%-95%) N = 183
No	14% (9%-19%) N = 39	22% (0%-46%) N = 3	68% (30%-100%) N = 4	16% (0%-38%) N = 2	9% (5%-14%) N = 18
Don't Know	0% (0%-1%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-1%) N = 1
Q4d. Have you ever been treated for arthritis?					
Yes	62% (58%-66%) N = 496	71% (55%-88%) N = 29	65% (35%-94%) N = 28	79% (64%-93%) N = 28	59% (55%-64%) N = 367
No	38% (33%-42%) N = 288	29% (12%-45%) N = 18	35% (6%-65%) N = 19	21% (7%-36%) N = 10	40% (35%-45%) N = 220
Don't Know	0% (0%-1%) N = 4	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-1%) N = 4

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q4e. Have you ever been treated for cancer?					
Yes	82% (76%-88%) N = 210	64% (30%-98%) N = 12	90% (76%-100%) N = 7	86% (61%-100%) N = 8	83% (76%-90%) N = 163
No	18% (12%-24%) N = 40	36% (2%-70%) N = 4	10% (0%-24%) N = 2	14% (0%-39%) N = 1	17% (10%-24%) N = 28
Q5a. Impact of losing your memory on daily life. (with 10 being the worst thing that could happen to them)					
1	4% (3%-5%) N = 120	6% (2%-10%) N = 16	9% (2%-16%) N = 16	6% (1%-11%) N = 9	3% (2%-4%) N = 50
2	1% (1%-2%) N = 29	2% (0%-5%) N = 5	0% (0%-1%) N = 2	1% (0%-4%) N = 1	1% (0%-1%) N = 16
3	1% (1%-2%) N = 27	2% (0%-4%) N = 2	2% (0%-6%) N = 4	1% (0%-3%) N = 1	1% (0%-2%) N = 16
4	0% (0%-1%) N = 17	0% (0%-0%) N = 1	0% (0%-1%) N = 2	0% (0%-1%) N = 1	1% (0%-1%) N = 12
5	5% (4%-6%) N = 145	5% (1%-8%) N = 11	5% (0%-11%) N = 13	2% (0%-4%) N = 6	5% (4%-6%) N = 101
6	2% (1%-3%) N = 60	3% (0%-5%) N = 7	0% (0%-1%) N = 3	2% (0%-5%) N = 3	2% (1%-2%) N = 36
7	3% (2%-3%) N = 90	2% (0%-4%) N = 6	1% (0%-2%) N = 9	2% (0%-4%) N = 4	3% (2%-4%) N = 66
8	7% (6%-8%) N = 242	6% (3%-10%) N = 20	7% (2%-13%) N = 23	5% (1%-8%) N = 7	8% (6%-9%) N = 177
9	8% (7%-9%) N = 245	2% (0%-3%) N = 6	19% (9%-28%) N = 36	7% (2%-11%) N = 8	9% (7%-10%) N = 176
10	67% (65%-70%) N = 2,146	71% (63%-78%) N = 192	51% (39%-62%) N = 184	73% (65%-81%) N = 129	67% (65%-70%) N = 1,457

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Don't Know	1% (1%-2%) N = 54	2% (0%-4%) N = 7	5% (0%-10%) N = 13	1% (0%-3%) N = 3	1% (0%-1%) N = 23
Refused	0% (0%-0%) N = 5	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 3
Q5b. Impact of losing your hearing on daily life. (with 10 being the worst thing that could happen to them)					
1	4% (3%-6%) N = 108	5% (1%-8%) N = 13	9% (2%-17%) N = 11	10% (4%-15%) N = 13	3% (2%-4%) N = 46
2	2% (1%-2%) N = 34	4% (1%-7%) N = 7	1% (0%-1%) N = 2	3% (0%-6%) N = 3	1% (1%-2%) N = 18
3	2% (1%-2%) N = 55	1% (0%-3%) N = 5	1% (0%-2%) N = 4	2% (0%-4%) N = 4	1% (1%-2%) N = 35
4	2% (1%-2%) N = 61	1% (0%-2%) N = 5	0% (0%-1%) N = 4	0% (0%-0%) N = 0	2% (1%-2%) N = 44
5	9% (8%-10%) N = 320	7% (2%-12%) N = 16	6% (1%-10%) N = 25	6% (2%-10%) N = 12	10% (8%-11%) N = 242
6	6% (5%-7%) N = 197	4% (1%-7%) N = 11	4% (0%-8%) N = 14	3% (0%-6%) N = 3	6% (5%-8%) N = 148
7	10% (9%-12%) N = 328	5% (1%-8%) N = 13	6% (2%-10%) N = 27	7% (3%-11%) N = 14	12% (11%-14%) N = 251
8	18% (16%-20%) N = 580	12% (7%-17%) N = 35	28% (17%-38%) N = 68	13% (7%-19%) N = 22	19% (17%-21%) N = 419
9	9% (7%-10%) N = 293	6% (2%-10%) N = 22	14% (6%-21%) N = 37	8% (3%-13%) N = 11	9% (8%-11%) N = 203
10	38% (36%-40%) N = 1,156	54% (46%-62%) N = 139	27% (18%-37%) N = 103	49% (40%-58%) N = 89	35% (32%-38%) N = 710

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Don't Know	1% (1%-1%) N = 44	2% (0%-3%) N = 7	5% (0%-10%) N = 10	1% (0%-2%) N = 1	1% (0%-1%) N = 15
Refused	0% (0%-0%) N = 4	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 2
Q5c. Impact of losing your eyesight on daily life. (with 10 being the worst thing that could happen to them)					
1	3% (2%-4%) N = 91	5% (1%-8%) N = 12	8% (2%-15%) N = 13	6% (1%-11%) N = 7	3% (2%-4%) N = 40
2	1% (0%-1%) N = 17	1% (0%-3%) N = 3	2% (0%-6%) N = 3	3% (0%-6%) N = 3	0% (0%-0%) N = 7
3	1% (0%-1%) N = 32	1% (0%-4%) N = 3	1% (0%-2%) N = 4	2% (0%-4%) N = 3	1% (0%-1%) N = 17
4	1% (0%-1%) N = 21	1% (0%-3%) N = 3	0% (0%-1%) N = 2	1% (0%-2%) N = 1	1% (0%-1%) N = 13
5	3% (2%-3%) N = 90	2% (0%-3%) N = 6	3% (0%-7%) N = 13	2% (0%-4%) N = 6	3% (2%-3%) N = 52
6	1% (1%-2%) N = 49	2% (0%-4%) N = 7	0% (0%-1%) N = 4	1% (0%-3%) N = 3	1% (1%-2%) N = 28
7	2% (2%-3%) N = 90	2% (0%-4%) N = 5	3% (1%-4%) N = 11	2% (0%-4%) N = 3	2% (2%-3%) N = 60
8	8% (6%-9%) N = 242	9% (4%-14%) N = 24	10% (3%-18%) N = 21	3% (0%-7%) N = 7	7% (6%-9%) N = 167
9	9% (8%-10%) N = 344	4% (2%-6%) N = 17	10% (4%-17%) N = 37	5% (1%-9%) N = 11	10% (9%-12%) N = 256
10	71% (69%-73%) N = 2,163	71% (63%-78%) N = 188	57% (46%-68%) N = 187	73% (65%-81%) N = 126	72% (69%-74%) N = 1,482

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Don't Know	1% (1%-1%) N = 38	2% (0%-4%) N = 5	5% (0%-10%) N = 10	2% (0%-4%) N = 2	0% (0%-1%) N = 10
Refused	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q5d. Impact of losing your speech on daily life. (with 10 being the worst thing that could happen to them)					
1	5% (4%-6%) N = 137	7% (2%-11%) N = 20	8% (1%-14%) N = 13	8% (3%-14%) N = 13	4% (3%-6%) N = 67
2	1% (1%-2%) N = 33	2% (0%-4%) N = 6	1% (0%-3%) N = 4	1% (0%-4%) N = 1	1% (0%-1%) N = 14
3	2% (1%-2%) N = 45	2% (0%-5%) N = 4	4% (0%-10%) N = 6	1% (0%-3%) N = 1	1% (1%-2%) N = 28
4	1% (1%-2%) N = 63	2% (0%-5%) N = 4	1% (0%-2%) N = 4	0% (0%-0%) N = 0	1% (1%-2%) N = 43
5	11% (10%-13%) N = 331	8% (4%-13%) N = 20	11% (4%-19%) N = 24	11% (5%-17%) N = 16	11% (10%-13%) N = 239
6	5% (4%-6%) N = 150	4% (0%-8%) N = 9	3% (0%-7%) N = 15	1% (0%-2%) N = 4	5% (4%-6%) N = 105
7	9% (7%-10%) N = 280	6% (2%-10%) N = 16	10% (4%-17%) N = 33	7% (2%-11%) N = 11	9% (8%-11%) N = 197
8	14% (12%-15%) N = 471	13% (8%-19%) N = 29	19% (10%-29%) N = 55	10% (4%-15%) N = 18	14% (12%-16%) N = 341
9	9% (8%-11%) N = 291	6% (3%-9%) N = 24	12% (5%-20%) N = 27	4% (1%-6%) N = 9	11% (9%-12%) N = 215
10	42% (40%-45%) N = 1,334	46% (38%-54%) N = 134	25% (16%-33%) N = 114	56% (47%-65%) N = 97	41% (38%-43%) N = 866

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Don't Know	1% (1%-1%) N = 42	2% (0%-5%) N = 6	5% (0%-10%) N = 10	1% (0%-3%) N = 2	1% (0%-1%) N = 17
Refused	0% (0%-0%) N = 3	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q5e. Impact of losing your arm or a leg on daily life. (with 10 being the worst thing that could happen to them)					
1	5% (4%-7%) N = 138	6% (2%-10%) N = 16	9% (3%-16%) N = 18	10% (4%-16%) N = 15	4% (3%-5%) N = 63
2	1% (1%-2%) N = 35	2% (0%-4%) N = 5	2% (0%-6%) N = 2	1% (0%-4%) N = 1	1% (1%-2%) N = 22
3	2% (1%-3%) N = 53	1% (0%-2%) N = 3	3% (0%-7%) N = 2	2% (0%-4%) N = 3	2% (1%-3%) N = 41
4	2% (1%-2%) N = 70	2% (0%-5%) N = 4	0% (0%-0%) N = 4	2% (0%-5%) N = 5	2% (1%-3%) N = 48
5	12% (10%-13%) N = 361	11% (6%-17%) N = 25	4% (0%-8%) N = 19	9% (4%-14%) N = 15	12% (10%-14%) N = 270
6	5% (4%-6%) N = 177	5% (1%-8%) N = 12	3% (0%-7%) N = 11	2% (0%-4%) N = 5	6% (4%-7%) N = 134
7	10% (8%-11%) N = 313	9% (4%-15%) N = 23	9% (3%-16%) N = 29	8% (2%-13%) N = 11	10% (8%-11%) N = 222
8	15% (13%-16%) N = 474	13% (8%-18%) N = 33	15% (7%-22%) N = 56	11% (5%-16%) N = 20	16% (14%-18%) N = 340
9	8% (6%-9%) N = 251	7% (2%-11%) N = 18	5% (1%-10%) N = 22	6% (2%-11%) N = 9	8% (7%-10%) N = 186
10	40% (38%-42%) N = 1,240	42% (34%-50%) N = 126	46% (35%-57%) N = 126	49% (40%-58%) N = 85	38% (36%-41%) N = 777

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Don't Know	1% (1%-2%) N = 62	2% (0%-4%) N = 7	3% (0%-7%) N = 15	2% (0%-3%) N = 3	1% (1%-1%) N = 27
Refused	0% (0%-0%) N = 6	0% (0%-0%) N = 1	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 3
Q6. Do you wear...					
Glasses	40% (38%-42%) N = 1,449	20% (15%-26%) N = 81	34% (23%-45%) N = 124	41% (32%-49%) N = 79	44% (41%-46%) N = 1,061
Contact lenses	2% (2%-3%) N = 89	2% (0%-3%) N = 7	5% (0%-11%) N = 18	1% (0%-2%) N = 3	2% (2%-3%) N = 51
Both glasses and contact lenses	10% (9%-11%) N = 334	4% (2%-7%) N = 21	15% (7%-23%) N = 45	8% (3%-14%) N = 13	11% (9%-13%) N = 224
Reading glasses only	14% (13%-16%) N = 527	9% (5%-13%) N = 43	17% (8%-26%) N = 45	12% (6%-18%) N = 25	15% (13%-17%) N = 362
None of the above	34% (31%-36%) N = 778	65% (57%-72%) N = 121	29% (19%-39%) N = 73	38% (29%-47%) N = 52	28% (26%-31%) N = 434
Don't Know	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q7. Did an eye care provider prescribe the glasses or contact lenses you wear?					
Yes	92% (91%-94%) N = 2,217	91% (84%-97%) N = 135	90% (81%-99%) N = 215	91% (84%-97%) N = 109	93% (91%-94%) N = 1,578
No	8% (6%-9%) N = 178	9% (3%-16%) N = 17	10% (1%-19%) N = 16	9% (3%-16%) N = 11	7% (5%-8%) N = 117
Don't Know	0% (0%-0%) N = 4	0% (0%-0%) N = 0	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 3

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q8. Would you say your eyesight, with classes or contact lenses when you wear them, is...					
Excellent	26% (24%-29%) N = 615	22% (13%-31%) N = 38	24% (13%-36%) N = 53	27% (17%-36%) N = 33	27% (24%-30%) N = 440
Very Good	39% (36%-41%) N = 947	30% (20%-41%) N = 50	37% (24%-50%) N = 82	28% (18%-38%) N = 29	41% (38%-44%) N = 719
Good	25% (23%-27%) N = 602	35% (24%-46%) N = 43	31% (19%-43%) N = 75	34% (23%-44%) N = 41	22% (20%-25%) N = 381
Fair	7% (6%-8%) N = 176	12% (6%-19%) N = 20	7% (0%-14%) N = 15	5% (1%-10%) N = 9	7% (5%-8%) N = 119
Poor	3% (2%-4%) N = 52	1% (0%-2%) N = 1	1% (0%-1%) N = 5	6% (1%-11%) N = 8	2% (1%-3%) N = 34
Don't Know	0% (0%-1%) N = 7	0% (0%-0%) N = 0	0% (0%-1%) N = 2	0% (0%-0%) N = 0	0% (0%-1%) N = 5
Q9. Would you say your eyesight is...					
Excellent	33% (29%-38%) N = 259	16% (8%-24%) N = 24	36% (17%-56%) N = 24	29% (15%-44%) N = 15	40% (34%-46%) N = 162
Very Good	30% (25%-34%) N = 232	20% (11%-28%) N = 25	36% (17%-56%) N = 26	28% (15%-42%) N = 17	34% (28%-39%) N = 139
Good	24% (20%-28%) N = 195	39% (28%-49%) N = 45	20% (3%-37%) N = 15	30% (16%-45%) N = 15	19% (14%-23%) N = 94
Fair	10% (7%-13%) N = 69	25% (16%-35%) N = 26	5% (0%-11%) N = 5	8% (0%-18%) N = 3	5% (3%-8%) N = 24
Poor	2% (1%-4%) N = 21	0% (0%-0%) N = 1	2% (0%-4%) N = 2	4% (0%-10%) N = 2	2% (1%-4%) N = 13
Don't Know	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-1%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 1

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Refused	0% (0%-1%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 2
Q10a. Do you wear glasses or contact lenses to see things that are close up?					
Yes	74% (72%-77%) N = 1,825	72% (62%-82%) N = 114	59% (45%-72%) N = 158	73% (62%-83%) N = 91	75% (73%-78%) N = 1,318
No	25% (23%-28%) N = 566	28% (18%-38%) N = 38	39% (25%-52%) N = 73	26% (16%-36%) N = 28	24% (22%-27%) N = 376
Don't Know	0% (0%-1%) N = 7	0% (0%-0%) N = 0	0% (0%-0%) N = 0	2% (0%-5%) N = 1	0% (0%-0%) N = 4
Refused	0% (0%-0%) N = 1	0% (0%-0%) N = 0	3% (0%-8%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0
Q10b. Do you wear glasses or contact lenses to see things at an intermediate distance?					
Yes	59% (56%-61%) N = 1,403	48% (37%-60%) N = 83	56% (43%-70%) N = 118	56% (45%-67%) N = 67	60% (57%-63%) N = 1,026
No	40% (38%-43%) N = 981	51% (40%-63%) N = 68	43% (30%-56%) N = 112	43% (32%-54%) N = 52	39% (36%-42%) N = 663
Don't Know	1% (0%-1%) N = 15	0% (0%-1%) N = 1	0% (0%-1%) N = 2	1% (0%-2%) N = 1	1% (0%-1%) N = 9
Q10c. Do you wear glasses or contact lenses to see things that are more distant?					
Yes	70% (68%-73%) N = 1,672	59% (47%-70%) N = 96	82% (72%-92%) N = 179	73% (63%-83%) N = 86	70% (68%-73%) N = 1,186
No	29% (27%-32%) N = 721	39% (27%-50%) N = 55	18% (8%-28%) N = 53	27% (17%-37%) N = 34	29% (27%-32%) N = 508
Don't Know	0% (0%-1%) N = 6	2% (0%-7%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-1%) N = 4

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q11. Has an eye care provider ever told you that you have an eye condition or disease?					
Yes	22% (20%-24%) N = 786	14% (9%-19%) N = 57	17% (9%-26%) N = 67	24% (17%-32%) N = 46	23% (21%-25%) N = 545
No	77% (75%-79%) N = 2,370	85% (80%-90%) N = 213	82% (74%-90%) N = 236	75% (68%-83%) N = 125	76% (74%-79%) N = 1,574
Don't Know	1% (0%-1%) N = 22	0% (0%-1%) N = 3	0% (0%-1%) N = 2	0% (0%-1%) N = 1	1% (0%-1%) N = 13
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q12a. Has an eye care provider ever told you that you have amblyopia?					
Yes	9% (7%-10%) N = 284	10% (6%-15%) N = 36	2% (0%-4%) N = 14	8% (4%-13%) N = 19	8% (7%-10%) N = 182
No	91% (89%-92%) N = 2,868	89% (85%-94%) N = 235	93% (88%-99%) N = 286	91% (87%-96%) N = 151	91% (90%-93%) N = 1,936
Don't Know	1% (0%-1%) N = 26	0% (0%-0%) N = 2	5% (0%-10%) N = 5	1% (0%-1%) N = 2	0% (0%-1%) N = 14
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q12b. Has an eye care provider ever told you that you have cataracts?					
Yes	13% (11%-14%) N = 539	5% (3%-8%) N = 25	16% (8%-25%) N = 51	9% (4%-13%) N = 20	14% (12%-16%) N = 400
No	87% (86%-88%) N = 2,629	95% (92%-97%) N = 247	80% (70%-89%) N = 251	91% (87%-95%) N = 151	86% (84%-88%) N = 1,730
Don't Know	0% (0%-0%) N = 10	0% (0%-0%) N = 1	4% (0%-10%) N = 3	0% (0%-1%) N = 1	0% (0%-0%) N = 2
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q12c. Has an eye care provider ever told you that you have diabetic retinopathy?					
Yes	1% (1%-2%) N = 52	2% (0%-4%) N = 7	0% (0%-1%) N = 5	2% (0%-3%) N = 5	1% (1%-2%) N = 27
No	98% (98%-99%) N = 3,109	97% (94%-99%) N = 262	99% (99%-100%) N = 299	97% (95%-99%) N = 164	99% (98%-99%) N = 2,098
Don't Know	0% (0%-1%) N = 17	1% (0%-3%) N = 4	0% (0%-0%) N = 1	1% (0%-2%) N = 3	0% (0%-0%) N = 7
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q12d. Has an eye care provider ever told you that you have glaucoma?					
Yes	3% (3%-4%) N = 122	2% (0%-4%) N = 8	5% (0%-11%) N = 15	6% (2%-10%) N = 12	3% (2%-4%) N = 77
No	96% (95%-97%) N = 3,040	98% (96%-100%) N = 264	94% (89%-100%) N = 288	92% (87%-96%) N = 156	97% (96%-98%) N = 2,049
Don't Know	0% (0%-1%) N = 16	0% (0%-0%) N = 1	0% (0%-1%) N = 2	2% (0%-4%) N = 4	0% (0%-0%) N = 6
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q12e. Has an eye care provider ever told you that you are suspect for glaucoma?					
Yes	4% (3%-4%) N = 115	3% (1%-6%) N = 12	2% (1%-3%) N = 14	2% (0%-5%) N = 4	4% (3%-5%) N = 74
No	96% (95%-97%) N = 2,904	97% (94%-99%) N = 250	94% (88%-99%) N = 268	97% (94%-100%) N = 151	96% (95%-97%) N = 1,966
Don't Know	1% (0%-1%) N = 21	0% (0%-0%) N = 2	5% (0%-10%) N = 6	1% (0%-2%) N = 1	0% (0%-1%) N = 9

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q12f. Has an eye care provider ever told you that you have age related macular degeneration?					
Yes	4% (3%-4%) N = 139	2% (0%-3%) N = 9	1% (0%-2%) N = 8	2% (0%-4%) N = 4	4% (3%-5%) N = 104
No	95% (94%-96%) N = 2,998	97% (95%-99%) N = 258	97% (93%-100%) N = 291	98% (95%-100%) N = 167	95% (94%-96%) N = 2,008
Don't Know	1% (1%-2%) N = 41	1% (0%-3%) N = 6	2% (0%-6%) N = 6	0% (0%-1%) N = 1	1% (0%-2%) N = 20
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q12g. Has an eye care provider ever told you that you have nearsightedness (myopia)?					
Yes	38% (36%-40%) N = 1,366	21% (15%-28%) N = 79	44% (33%-55%) N = 153	36% (28%-45%) N = 70	41% (38%-44%) N = 965
No	61% (58%-63%) N = 1,771	77% (71%-84%) N = 192	52% (41%-63%) N = 150	64% (55%-72%) N = 101	58% (55%-60%) N = 1,132
Don't Know	1% (1%-2%) N = 41	1% (0%-3%) N = 2	4% (0%-9%) N = 2	0% (0%-1%) N = 1	1% (1%-2%) N = 35
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q12h. Has an eye care provider ever told you that you have farsightedness (presbyopia)?					
Yes	29% (27%-32%) N = 1,121	14% (9%-19%) N = 63	20% (12%-29%) N = 105	25% (17%-33%) N = 45	33% (30%-35%) N = 807
No	69% (67%-71%) N = 2,000	84% (79%-90%) N = 207	74% (64%-83%) N = 195	75% (67%-82%) N = 125	66% (63%-68%) N = 1,286
Don't Know	2% (1%-2%) N = 57	2% (0%-4%) N = 3	6% (0%-12%) N = 5	0% (0%-1%) N = 2	2% (1%-2%) N = 39
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q12i. Has an eye care provider ever told you that you have any other eye condition or disease?					
Yes	5% (4%-6%) N = 217	1% (0%-2%) N = 9	1% (0%-2%) N = 14	2% (0%-4%) N = 8	6% (5%-7%) N = 164
No	94% (93%-95%) N = 2,943	99% (98%-100%) N = 262	99% (98%-99%) N = 289	98% (96%-100%) N = 164	93% (92%-94%) N = 1,956
Don't Know	0% (0%-1%) N = 17	0% (0%-0%) N = 2	0% (0%-1%) N = 2	0% (0%-0%) N = 0	1% (0%-1%) N = 12
Refused	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q13a. Are you receiving treatment for amblyopia?					
Yes	37% (29%-44%) N = 114	16% (2%-31%) N = 13	11% (0%-23%) N = 4	50% (21%-78%) N = 9	40% (31%-49%) N = 76
No	63% (56%-71%) N = 170	84% (69%-98%) N = 23	89% (77%-100%) N = 10	50% (22%-79%) N = 10	60% (51%-69%) N = 106
Q13b. Are you receiving treatment for cataracts?					
Yes	63% (57%-68%) N = 349	38% (13%-63%) N = 14	65% (38%-93%) N = 33	69% (45%-93%) N = 13	65% (59%-70%) N = 268
No	37% (31%-42%) N = 185	62% (37%-87%) N = 11	35% (7%-62%) N = 18	31% (7%-55%) N = 7	35% (29%-41%) N = 127
Don't Know	1% (0%-1%) N = 4	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	1% (0%-1%) N = 4
Refused	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q13c. Are you receiving treatment for diabetic retinopathy?					
Yes	63% (45%-81%) N = 34	69% (30%-100%) N = 5	20% (0%-53%) N = 2	57% (11%-100%) N = 3	61% (38%-85%) N = 17

Response	Everyone aged 18+	Hispanic	Asian	Black	White
No	32% (14%-50%) N = 16	31% (0%-70%) N = 2	80% (47%-100%) N = 3	23% (0%-64%) N = 1	35% (11%-59%) N = 9
Don't Know	5% (0%-12%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	20% (0%-56%) N = 1	4% (0%-11%) N = 1
Q13d. Are you receiving treatment for glaucoma?					
Yes	79% (70%-88%) N = 95	57% (12%-100%) N = 6	94% (84%-100%) N = 12	73% (45%-100%) N = 9	83% (74%-92%) N = 61
No	21% (12%-30%) N = 26	43% (0%-88%) N = 2	6% (0%-16%) N = 3	27% (0%-55%) N = 3	17% (8%-26%) N = 15
Refused	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q13e. Are you receiving treatment for suspect glaucoma?					
Yes	54% (42%-66%) N = 67	75% (42%-100%) N = 9	72% (44%-99%) N = 8	15% (0%-46%) N = 1	54% (40%-68%) N = 43
No	46% (34%-58%) N = 48	25% (0%-58%) N = 3	28% (1%-56%) N = 6	85% (54%-100%) N = 3	46% (32%-60%) N = 31
Q13f. Are you receiving treatment for age related macular degeneration?					
Yes	56% (45%-67%) N = 82	43% (0%-90%) N = 4	23% (0%-52%) N = 3	15% (0%-46%) N = 1	63% (52%-75%) N = 69
No	42% (32%-53%) N = 55	57% (10%-100%) N = 5	77% (48%-100%) N = 5	85% (54%-100%) N = 3	35% (23%-46%) N = 33
Don't Know	2% (0%-4%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	2% (0%-5%) N = 2
Q13g. Are you receiving treatment for nearsightedness?					
Yes	72% (68%-75%) N = 1,020	62% (46%-78%) N = 51	64% (48%-81%) N = 118	62% (48%-75%) N = 42	74% (71%-78%) N = 740

Response	Everyone aged 18+	Hispanic	Asian	Black	White
No	28% (25%-31%) N = 339	36% (20%-52%) N = 26	31% (15%-47%) N = 34	38% (25%-52%) N = 28	26% (22%-29%) N = 221
Don't Know	0% (0%-1%) N = 6	2% (0%-5%) N = 2	4% (0%-13%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 3
Refused	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q13h. Are you receiving treatment for farsightedness?					
Yes	63% (59%-67%) N = 739	60% (41%-79%) N = 38	62% (41%-83%) N = 68	51% (34%-69%) N = 22	65% (61%-69%) N = 549
No	36% (32%-40%) N = 379	40% (21%-59%) N = 25	38% (17%-59%) N = 37	49% (31%-66%) N = 23	35% (30%-39%) N = 255
Don't Know	0% (0%-1%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-1%) N = 3
Q13i. Are you receiving treatment for any other eye condition or disease?					
Yes	57% (48%-66%) N = 137	68% (25%-100%) N = 7	88% (71%-100%) N = 12	83% (58%-100%) N = 5	56% (46%-66%) N = 101
No	42% (34%-51%) N = 77	32% (0%-75%) N = 2	12% (0%-29%) N = 2	17% (0%-42%) N = 3	44% (34%-54%) N = 60
Don't Know	0% (0%-1%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-1%) N = 3
Q14. Have you ever had an eye injury or trauma requiring care in the emergency room or doctor's office?					
Yes	19% (17%-21%) N = 547	10% (5%-15%) N = 33	5% (2%-7%) N = 30	15% (8%-21%) N = 24	21% (19%-23%) N = 415
No	81% (79%-83%) N = 2,626	90% (85%-95%) N = 240	95% (93%-98%) N = 275	85% (79%-92%) N = 148	79% (76%-81%) N = 1,715

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Don't Know	0% (0%-0%) N = 4	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 2
Refused	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q15. For the last eye injury that you can remember, did it occur playing sports/recreational activity?					
Selected	12% (8%-15%) N = 61	7% (0%-17%) N = 2	32% (10%-54%) N = 8	18% (0%-39%) N = 3	11% (8%-15%) N = 44
Not selected	88% (85%-92%) N = 486	93% (83%-100%) N = 31	68% (46%-90%) N = 22	82% (61%-100%) N = 21	89% (85%-92%) N = 371
Q15a. For the last eye injury that you can remember, did it occur working on a hobby?					
Selected	7% (4%-10%) N = 30	6% (0%-15%) N = 2	6% (0%-15%) N = 2	9% (0%-26%) N = 1	7% (4%-11%) N = 24
Not selected	93% (90%-96%) N = 517	94% (85%-100%) N = 31	94% (85%-100%) N = 28	91% (74%-100%) N = 23	93% (89%-96%) N = 391
Q15b. For the last eye injury that you can remember, did it occur at your job or in the workplace?					
Selected	19% (15%-23%) N = 104	10% (0%-24%) N = 5	17% (0%-38%) N = 4	16% (2%-30%) N = 5	20% (15%-25%) N = 79
Not selected	81% (77%-85%) N = 443	90% (76%-100%) N = 28	83% (62%-100%) N = 26	84% (70%-98%) N = 19	80% (75%-85%) N = 336
Q15c. For the last eye injury that you can remember, did it occur in a motor vehicle?					
Selected	4% (2%-7%) N = 24	0% (0%-0%) N = 1	4% (0%-11%) N = 1	0% (0%-0%) N = 0	5% (3%-8%) N = 20
Not selected	96% (93%-98%) N = 523	100% (100%-100%) N = 32	96% (89%-100%) N = 29	100% (100%-100%) N = 24	95% (92%-97%) N = 395

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q15d. For the last eye injury that you can remember, did it occur while gardening/lawn care?					
Selected	3% (1%-5%) N = 16	8% (0%-18%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	3% (1%-5%) N = 13
Not selected	97% (95%-99%) N = 531	92% (82%-100%) N = 31	100% (100%-100%) N = 30	100% (100%-100%) N = 24	97% (95%-99%) N = 402
Q15e. For the last eye injury that you can remember, did it occur in the home?					
Selected	14% (10%-17%) N = 81	2% (0%-7%) N = 3	6% (0%-15%) N = 2	5% (0%-12%) N = 2	15% (11%-20%) N = 67
Not selected	86% (83%-90%) N = 466	98% (93%-100%) N = 30	94% (85%-100%) N = 28	95% (88%-100%) N = 22	85% (80%-89%) N = 348
Q15f. For the last eye injury that you can remember, did it occur some other way?					
Selected	38% (33%-44%) N = 202	64% (42%-87%) N = 16	31% (8%-53%) N = 10	51% (28%-75%) N = 13	35% (29%-41%) N = 150
Not selected	62% (56%-67%) N = 345	36% (13%-58%) N = 17	69% (47%-92%) N = 20	49% (25%-72%) N = 11	65% (59%-71%) N = 265
Q15g. For the last eye injury that you can remember, do not remember how it occurred.					
Selected	3% (1%-4%) N = 29	4% (0%-11%) N = 2	5% (0%-11%) N = 3	0% (0%-0%) N = 0	2% (1%-4%) N = 18
Not selected	97% (96%-99%) N = 518	96% (89%-100%) N = 31	95% (89%-100%) N = 27	100% (100%-100%) N = 24	98% (96%-99%) N = 397
Q15h. For the last eye injury that you can remember, refused to specify how it occurred.					
Not selected	100% (100%-100%) N = 547	100% (100%-100%) N = 33	100% (100%-100%) N = 30	100% (100%-100%) N = 24	100% (100%-100%) N = 415

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q16. Have you experienced a permanent change in your vision or permanent loss of vision because of this injury or trauma?					
Yes	11% (8%-15%) N = 61	5% (0%-11%) N = 3	8% (0%-19%) N = 2	20% (1%-39%) N = 5	11% (7%-14%) N = 45
No	87% (84%-91%) N = 479	95% (89%-100%) N = 30	92% (81%-100%) N = 28	80% (61%-99%) N = 19	88% (84%-92%) N = 365
Don't Know	1% (0%-3%) N = 7	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	1% (0%-3%) N = 5
Q17. Did you have to stay in a hospital overnight or longer because of this injury or trauma?					
Yes	10% (7%-13%) N = 54	16% (0%-39%) N = 5	9% (0%-22%) N = 2	18% (0%-38%) N = 3	9% (6%-12%) N = 41
No	90% (86%-93%) N = 490	84% (61%-100%) N = 28	91% (78%-100%) N = 28	82% (62%-100%) N = 21	91% (88%-94%) N = 371
Don't Know	0% (0%-1%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-1%) N = 2
Refused	0% (0%-1%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-1%) N = 1
Q18. Have you ever had your eyes examined by a health care provider?					
Yes	91% (90%-93%) N = 2,956	69% (62%-77%) N = 219	86% (78%-94%) N = 281	95% (90%-99%) N = 163	94% (93%-96%) N = 2,037
No	9% (7%-10%) N = 216	31% (23%-38%) N = 54	14% (6%-22%) N = 24	5% (1%-10%) N = 9	5% (4%-7%) N = 91
Don't Know	0% (0%-0%) N = 5	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 4
Refused	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q19. Were your pupils dilated?					
Yes	74% (72%-76%) N = 2,343	54% (45%-64%) N = 143	73% (63%-83%) N = 215	66% (57%-75%) N = 114	78% (75%-80%) N = 1,686
No	23% (21%-25%) N = 540	43% (34%-53%) N = 72	23% (13%-33%) N = 57	31% (22%-40%) N = 44	19% (17%-22%) N = 304
Don't Know	3% (2%-4%) N = 73	2% (0%-4%) N = 4	4% (0%-8%) N = 9	3% (0%-5%) N = 5	3% (2%-4%) N = 47
Q20. When you typically have your eyes examined, who examines them?					
An eye care provider	85% (83%-87%) N = 2,593	80% (72%-88%) N = 182	84% (75%-92%) N = 242	76% (68%-85%) N = 128	86% (84%-88%) N = 1,827
Your primary care provider	11% (10%-13%) N = 277	16% (9%-23%) N = 32	8% (3%-14%) N = 31	16% (9%-23%) N = 25	11% (9%-12%) N = 157
Someone else	2% (1%-3%) N = 47	3% (0%-8%) N = 4	3% (0%-8%) N = 5	4% (0%-7%) N = 5	2% (1%-3%) N = 29
Don't Know	2% (1%-2%) N = 35	1% (0%-2%) N = 1	3% (0%-7%) N = 2	4% (0%-8%) N = 4	1% (1%-2%) N = 22
Refused	0% (0%-0%) N = 4	0% (0%-0%) N = 0	2% (0%-7%) N = 1	0% (0%-0%) N = 1	0% (0%-0%) N = 2
Q21. When was the last eye examination you had by an eye care provider such as an ophthalmologist or optometrist?					
Within the past month	10% (8%-11%) N = 293	7% (3%-11%) N = 18	12% (4%-20%) N = 32	14% (7%-20%) N = 20	9% (8%-11%) N = 194
Within the past year	47% (45%-50%) N = 1,530	56% (47%-65%) N = 113	54% (42%-66%) N = 161	44% (35%-53%) N = 83	47% (44%-50%) N = 1,033
Within the past 2 years	17% (15%-18%) N = 486	16% (10%-22%) N = 42	13% (5%-20%) N = 43	10% (5%-16%) N = 20	18% (16%-20%) N = 346

Response	Everyone aged 18+	Hispanic	Asian	Black	White
2 or more years ago	23% (21%-26%) N = 571	19% (11%-26%) N = 38	13% (6%-21%) N = 36	29% (21%-38%) N = 37	23% (21%-26%) N = 416
Never	2% (1%-3%) N = 55	2% (0%-5%) N = 7	5% (0%-11%) N = 7	2% (0%-6%) N = 3	2% (1%-3%) N = 34
Don't Know	1% (0%-1%) N = 19	0% (0%-1%) N = 1	0% (0%-0%) N = 1	0% (0%-0%) N = 0	1% (0%-1%) N = 14
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	2% (0%-7%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0
Q22. What was the one main reason you had your eyes examined the last time by an eye care provider?					
For a regular check up	52% (49%-54%) N = 1,572	45% (36%-55%) N = 103	52% (39%-64%) N = 162	54% (45%-63%) N = 85	52% (50%-55%) N = 1,085
Needed new glasses/contacts	17% (15%-19%) N = 494	10% (5%-15%) N = 28	15% (7%-23%) N = 43	17% (10%-24%) N = 30	18% (16%-20%) N = 354
Had trouble seeing	13% (11%-14%) N = 349	17% (10%-24%) N = 34	9% (2%-16%) N = 24	10% (4%-15%) N = 17	13% (11%-14%) N = 244
Had pain in eyes	1% (1%-2%) N = 29	5% (1%-9%) N = 10	4% (0%-9%) N = 5	1% (0%-2%) N = 1	1% (0%-1%) N = 10
Had headaches	3% (2%-4%) N = 53	1% (0%-2%) N = 4	1% (0%-2%) N = 2	2% (0%-5%) N = 2	3% (2%-4%) N = 43
Had eye infection, injury, eye disease	4% (3%-5%) N = 107	6% (1%-11%) N = 10	9% (1%-17%) N = 12	3% (1%-6%) N = 9	4% (3%-5%) N = 70
Received notice for regular eye exam	1% (1%-2%) N = 41	1% (0%-2%) N = 2	3% (0%-8%) N = 6	0% (0%-0%) N = 0	1% (1%-2%) N = 28
Family or friend suggested	1% (0%-1%) N = 20	0% (0%-0%) N = 0	1% (0%-2%) N = 1	1% (0%-2%) N = 1	1% (0%-2%) N = 16

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Referred by other health care provider	1% (0%-1%) N = 23	3% (0%-6%) N = 4	0% (0%-0%) N = 1	2% (0%-3%) N = 3	1% (0%-1%) N = 12
Some other reason	7% (5%-8%) N = 167	12% (5%-18%) N = 15	3% (0%-8%) N = 11	9% (3%-15%) N = 10	6% (5%-8%) N = 113
Don't Know	1% (0%-2%) N = 25	0% (0%-0%) N = 1	3% (0%-8%) N = 5	2% (0%-5%) N = 2	1% (0%-2%) N = 14
Q23. What was the one main reason you have never had your eyes examined by an eye care provider?					
Haven't had any problems	59% (51%-67%) N = 146	60% (45%-75%) N = 35	76% (52%-100%) N = 22	52% (19%-85%) N = 5	61% (51%-71%) N = 69
Primary care provider didn't tell me to	1% (0%-3%) N = 9	0% (0%-0%) N = 1	1% (0%-3%) N = 3	0% (0%-0%) N = 0	3% (0%-6%) N = 3
I can get along well enough with my eye problem	0% (0%-1%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	1% (0%-2%) N = 2
I don't like doctors and avoid them	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0
I don't want to know if something is wrong	0% (0%-1%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
I would lose time from my work	0% (0%-0%) N = 1	0% (0%-0%) N = 0	1% (0%-2%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0
The examination costs too much	4% (1%-8%) N = 9	6% (0%-13%) N = 4	0% (0%-0%) N = 0	0% (0%-0%) N = 0	4% (0%-9%) N = 4
Not covered by insurance	7% (3%-12%) N = 14	9% (1%-17%) N = 5	10% (0%-29%) N = 1	30% (0%-61%) N = 3	4% (0%-8%) N = 5
There are no doctors close enough to where I live or work	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Not sure where to go	1% (0%-1%) N = 4	1% (0%-3%) N = 2	0% (0%-0%) N = 0	3% (0%-10%) N = 1	0% (0%-0%) N = 0
Never got around to it	3% (1%-5%) N = 15	2% (0%-6%) N = 1	0% (0%-0%) N = 0	15% (0%-32%) N = 3	2% (0%-4%) N = 5
Never thought about it	7% (3%-12%) N = 15	12% (1%-23%) N = 5	1% (0%-3%) N = 1	0% (0%-0%) N = 0	6% (1%-12%) N = 7
Other	6% (2%-9%) N = 21	3% (0%-7%) N = 3	10% (0%-29%) N = 1	0% (0%-0%) N = 0	8% (2%-13%) N = 14
Don't Know	8% (4%-12%) N = 33	7% (0%-14%) N = 5	1% (0%-2%) N = 2	0% (0%-0%) N = 0	10% (4%-15%) N = 17
Refused	2% (0%-4%) N = 6	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	2% (0%-4%) N = 3
Q24a. Likely to have eye exam if advised by family members?					
Very likely	34% (32%-37%) N = 1,059	32% (25%-40%) N = 90	27% (17%-37%) N = 86	48% (39%-57%) N = 81	33% (31%-36%) N = 687
Somewhat likely	43% (41%-46%) N = 1,366	45% (37%-53%) N = 114	43% (32%-54%) N = 131	38% (29%-47%) N = 65	44% (42%-47%) N = 949
Not at all likely	21% (19%-23%) N = 716	22% (15%-28%) N = 63	25% (16%-35%) N = 82	14% (8%-21%) N = 25	21% (19%-24%) N = 475
Don't Know	1% (0%-1%) N = 29	1% (0%-1%) N = 6	2% (0%-6%) N = 5	0% (0%-1%) N = 1	1% (0%-1%) N = 15
Refused	0% (0%-1%) N = 10	0% (0%-0%) N = 0	2% (0%-6%) N = 1	0% (0%-0%) N = 0	0% (0%-1%) N = 7

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q24b. Likely to have eye exam if advised by primary care provider					
Very likely	80% (78%-82%) N = 2,594	67% (59%-74%) N = 197	72% (61%-82%) N = 238	91% (85%-96%) N = 155	81% (79%-84%) N = 1,769
Somewhat likely	15% (13%-16%) N = 404	30% (22%-37%) N = 61	13% (6%-21%) N = 37	9% (4%-14%) N = 15	13% (11%-15%) N = 252
Not at all likely	4% (3%-5%) N = 144	3% (0%-6%) N = 11	12% (4%-20%) N = 22	0% (0%-0%) N = 0	5% (3%-6%) N = 93
Don't Know	1% (0%-1%) N = 30	1% (0%-2%) N = 4	1% (0%-2%) N = 7	1% (0%-1%) N = 2	1% (0%-1%) N = 15
Refused	0% (0%-1%) N = 8	0% (0%-0%) N = 0	2% (0%-6%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 4
Q24c. Likely to have eye exam if advised by pharmacist?					
Very likely	23% (21%-25%) N = 707	22% (15%-29%) N = 65	28% (18%-38%) N = 65	36% (28%-45%) N = 62	21% (19%-24%) N = 433
Somewhat likely	33% (31%-35%) N = 1,013	46% (38%-54%) N = 106	28% (18%-37%) N = 98	31% (23%-40%) N = 51	32% (30%-35%) N = 673
Not at all likely	41% (39%-43%) N = 1,376	28% (21%-35%) N = 92	41% (30%-52%) N = 130	32% (24%-41%) N = 57	44% (42%-47%) N = 976
Don't Know	2% (1%-3%) N = 75	4% (0%-7%) N = 10	2% (0%-3%) N = 11	1% (0%-1%) N = 2	2% (1%-3%) N = 46
Refused	0% (0%-1%) N = 9	0% (0%-0%) N = 0	2% (0%-6%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 5
Q24d. Likely to have eye exam if advised by friends?					
Very likely	16% (14%-17%) N = 505	13% (8%-18%) N = 46	17% (9%-26%) N = 45	29% (21%-37%) N = 47	14% (12%-16%) N = 305
Somewhat likely	40% (38%-42%) N = 1,237	46% (37%-54%) N = 113	35% (25%-46%) N = 108	40% (31%-49%) N = 62	40% (37%-43%) N = 859

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Not at all likely	43% (41%-46%) N = 1,389	38% (30%-46%) N = 108	44% (33%-55%) N = 143	31% (23%-39%) N = 61	45% (43%-48%) N = 943
Don't Know	1% (0%-1%) N = 43	3% (0%-6%) N = 6	1% (0%-2%) N = 8	0% (0%-1%) N = 2	1% (0%-1%) N = 23
Refused	0% (0%-1%) N = 6	0% (0%-0%) N = 0	2% (0%-6%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 3
Q24e. Likely to have eye exam if advised by co-workers/employers?					
Very likely	26% (24%-28%) N = 799	23% (16%-30%) N = 68	23% (14%-33%) N = 67	42% (33%-51%) N = 68	24% (22%-27%) N = 503
Somewhat likely	40% (38%-43%) N = 1,223	52% (44%-60%) N = 121	38% (27%-49%) N = 115	35% (27%-44%) N = 59	40% (37%-42%) N = 836
Not at all likely	31% (29%-33%) N = 1,048	23% (16%-30%) N = 73	36% (25%-46%) N = 113	22% (15%-29%) N = 43	33% (31%-36%) N = 718
Don't Know	2% (2%-3%) N = 93	2% (0%-4%) N = 11	1% (0%-2%) N = 9	1% (0%-3%) N = 2	2% (2%-3%) N = 62
Refused	1% (0%-1%) N = 17	0% (0%-0%) N = 0	2% (0%-6%) N = 1	0% (0%-0%) N = 0	0% (0%-1%) N = 14
Q24f. Likely to have eye exam if advised by religious leader?					
Very likely	13% (11%-15%) N = 367	15% (9%-20%) N = 39	9% (3%-16%) N = 30	29% (21%-37%) N = 47	10% (9%-12%) N = 199
Somewhat likely	29% (27%-31%) N = 844	43% (35%-51%) N = 95	22% (13%-31%) N = 67	37% (28%-46%) N = 59	27% (24%-29%) N = 554
Not at all likely	56% (54%-58%) N = 1,885	39% (32%-47%) N = 130	64% (53%-74%) N = 196	33% (24%-41%) N = 63	61% (59%-64%) N = 1,330
Don't Know	2% (1%-2%) N = 69	3% (0%-6%) N = 9	3% (0%-7%) N = 11	1% (0%-2%) N = 2	1% (1%-2%) N = 40

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Refused	1% (0%-1%) N = 15	0% (0%-0%) N = 0	2% (0%-6%) N = 1	0% (0%-1%) N = 1	0% (0%-1%) N = 10
Q25. Have you ever heard of glaucoma?					
Yes	90% (89%-92%) N = 2,922	61% (53%-69%) N = 199	72% (62%-83%) N = 262	94% (90%-99%) N = 162	95% (94%-97%) N = 2,053
No	9% (8%-11%) N = 248	39% (31%-47%) N = 73	26% (15%-36%) N = 42	6% (1%-10%) N = 10	5% (3%-6%) N = 78
Don't Know	0% (0%-0%) N = 8	0% (0%-1%) N = 1	2% (0%-6%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 2
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0
Q26a. Glaucoma can cause vision loss.					
True	92% (91%-94%) N = 2,694	87% (80%-94%) N = 176	89% (81%-96%) N = 231	97% (94%-100%) N = 156	92% (90%-94%) N = 1,908
False	1% (0%-1%) N = 27	0% (0%-0%) N = 0	4% (0%-9%) N = 6	0% (0%-0%) N = 1	1% (0%-1%) N = 13
Don't Know	7% (6%-8%) N = 200	13% (6%-20%) N = 23	8% (2%-13%) N = 25	3% (0%-6%) N = 5	7% (6%-9%) N = 131
Refused	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q26b. There are early warning symptoms for glaucoma.					
True	66% (64%-69%) N = 1,904	70% (61%-79%) N = 134	72% (61%-83%) N = 174	76% (68%-84%) N = 121	65% (62%-67%) N = 1,322
False	8% (7%-9%) N = 273	5% (1%-10%) N = 12	8% (1%-15%) N = 22	5% (1%-9%) N = 7	9% (8%-10%) N = 215
Don't Know	26% (23%-28%) N = 743	25% (16%-33%) N = 53	20% (11%-29%) N = 65	19% (12%-26%) N = 34	26% (24%-29%) N = 515

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q26c. Vision loss from glaucoma can be prevented.					
True	67% (64%-69%) N = 1,983	69% (59%-78%) N = 146	70% (59%-81%) N = 180	74% (66%-82%) N = 116	66% (63%-68%) N = 1,373
False	9% (7%-10%) N = 241	6% (1%-11%) N = 10	10% (2%-17%) N = 25	7% (3%-12%) N = 12	9% (7%-10%) N = 173
Don't Know	25% (22%-27%) N = 696	25% (16%-34%) N = 43	21% (11%-30%) N = 57	19% (12%-26%) N = 34	25% (23%-28%) N = 505
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 2
Q26d. Glaucoma can be treated.					
True	86% (84%-88%) N = 2,565	81% (72%-89%) N = 169	86% (77%-95%) N = 229	92% (86%-97%) N = 148	86% (84%-88%) N = 1,808
False	3% (2%-4%) N = 64	5% (0%-10%) N = 5	3% (0%-9%) N = 6	4% (0%-8%) N = 6	2% (1%-3%) N = 37
Don't Know	11% (9%-13%) N = 292	15% (7%-22%) N = 25	11% (3%-18%) N = 27	4% (0%-9%) N = 8	11% (10%-13%) N = 207
Refused	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q27. Have you ever heard of age-related macular degeneration?					
Yes	52% (49%-54%) N = 1,787	29% (21%-36%) N = 91	32% (22%-42%) N = 132	34% (25%-42%) N = 66	59% (56%-62%) N = 1,389
No	47% (44%-49%) N = 1,341	70% (62%-77%) N = 176	63% (53%-74%) N = 166	65% (57%-74%) N = 103	40% (37%-43%) N = 715
Don't Know	1% (1%-2%) N = 50	2% (0%-4%) N = 6	4% (0%-10%) N = 7	1% (0%-2%) N = 3	1% (1%-2%) N = 29

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0
Q28a. Vitamins and zinc can help prevent vision loss from AMD in some people.					
True	46% (43%-49%) N = 797	48% (34%-63%) N = 36	55% (36%-74%) N = 62	34% (20%-48%) N = 27	46% (43%-50%) N = 625
False	8% (6%-10%) N = 134	17% (6%-28%) N = 12	2% (0%-4%) N = 5	14% (4%-23%) N = 8	7% (5%-9%) N = 101
Don't Know	46% (43%-49%) N = 856	35% (22%-48%) N = 43	43% (24%-62%) N = 65	52% (37%-67%) N = 31	47% (43%-50%) N = 663
Q28b. AMD usually runs in families.					
True	41% (38%-44%) N = 687	52% (38%-66%) N = 42	35% (16%-54%) N = 40	47% (32%-62%) N = 32	40% (37%-44%) N = 531
False	12% (10%-14%) N = 212	20% (8%-32%) N = 16	14% (2%-27%) N = 18	12% (1%-23%) N = 5	12% (9%-14%) N = 158
Don't Know	47% (44%-50%) N = 887	28% (17%-40%) N = 33	50% (31%-70%) N = 74	41% (26%-56%) N = 29	48% (45%-51%) N = 699
Refused	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-1%) N = 1
Q28c. A person can have AMD and not know it.					
True	68% (65%-70%) N = 1,181	72% (59%-85%) N = 66	62% (44%-81%) N = 88	68% (54%-81%) N = 43	67% (64%-70%) N = 906
False	11% (9%-13%) N = 205	11% (1%-22%) N = 5	4% (0%-7%) N = 13	8% (1%-16%) N = 6	11% (9%-13%) N = 172
Don't Know	21% (19%-24%) N = 401	17% (7%-26%) N = 20	34% (15%-53%) N = 31	24% (11%-36%) N = 17	21% (19%-24%) N = 311

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q28d. AMD can cause central vision loss.					
True	70% (68%-73%) N = 1,258	63% (48%-77%) N = 56	69% (51%-86%) N = 94	73% (61%-85%) N = 43	71% (68%-74%) N = 994
False	3% (2%-5%) N = 50	10% (0%-20%) N = 5	1% (0%-3%) N = 4	2% (0%-5%) N = 2	3% (2%-4%) N = 37
Don't Know	26% (24%-29%) N = 479	28% (15%-40%) N = 30	30% (13%-48%) N = 34	26% (14%-37%) N = 21	26% (23%-29%) N = 358
Q29. Have you ever heard of diabetic eye disease such as diabetic retinopathy?					
Yes	51% (48%-53%) N = 1,802	37% (30%-45%) N = 124	45% (34%-57%) N = 157	45% (36%-54%) N = 93	54% (51%-56%) N = 1,272
No	47% (45%-50%) N = 1,319	60% (52%-68%) N = 140	51% (39%-62%) N = 144	55% (46%-64%) N = 79	44% (42%-47%) N = 821
Don't Know	2% (1%-3%) N = 57	2% (0%-4%) N = 9	4% (0%-9%) N = 4	0% (0%-0%) N = 0	2% (1%-3%) N = 40
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0
Q30a. People with diabetes are at higher risk for eye disease than people without diabetes.					
True	91% (90%-93%) N = 1,650	88% (80%-96%) N = 110	96% (93%-99%) N = 143	92% (87%-97%) N = 83	92% (90%-94%) N = 1,184
False	4% (2%-5%) N = 52	6% (0%-13%) N = 7	2% (0%-4%) N = 5	2% (0%-5%) N = 3	3% (2%-5%) N = 31
Don't Know	5% (4%-6%) N = 100	6% (0%-11%) N = 7	2% (0%-4%) N = 9	5% (1%-9%) N = 7	4% (3%-6%) N = 57

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q30b. Eye disease caused by diabetes usually has early warning symptoms.					
True	64% (61%-66%) N = 1,097	84% (74%-93%) N = 100	62% (46%-79%) N = 102	74% (64%-84%) N = 65	60% (57%-64%) N = 735
False	11% (9%-13%) N = 207	6% (0%-13%) N = 7	8% (0%-16%) N = 16	10% (2%-17%) N = 8	12% (10%-14%) N = 156
Don't Know	25% (23%-28%) N = 498	10% (3%-17%) N = 17	30% (14%-46%) N = 39	16% (8%-24%) N = 20	27% (24%-30%) N = 381
Q30c. Vision loss caused by diabetes can be prevented.					
True	69% (66%-72%) N = 1,232	70% (58%-82%) N = 87	73% (58%-88%) N = 123	71% (60%-83%) N = 68	68% (65%-71%) N = 840
False	11% (9%-13%) N = 169	16% (6%-27%) N = 15	1% (0%-2%) N = 5	13% (5%-21%) N = 10	11% (9%-13%) N = 128
Don't Know	21% (18%-23%) N = 401	13% (6%-21%) N = 22	26% (11%-41%) N = 29	16% (6%-26%) N = 15	22% (19%-24%) N = 304
Q30d. People with diabetes should have a dilated eye exam at least once a year.					
True	85% (83%-87%) N = 1,526	88% (80%-95%) N = 110	78% (64%-91%) N = 120	92% (86%-98%) N = 84	85% (82%-87%) N = 1,089
False	1% (0%-2%) N = 19	0% (0%-0%) N = 0	2% (0%-4%) N = 4	0% (0%-0%) N = 0	1% (0%-2%) N = 12
Don't Know	14% (12%-16%) N = 257	12% (5%-20%) N = 14	21% (8%-34%) N = 33	8% (2%-14%) N = 9	14% (12%-17%) N = 171
Q30e. Eye disease caused by diabetes cannot be treated.					
True	17% (14%-19%) N = 270	27% (15%-38%) N = 27	33% (17%-50%) N = 24	23% (12%-34%) N = 19	14% (12%-17%) N = 177
False	59% (56%-62%) N = 1,065	48% (36%-61%) N = 67	43% (27%-59%) N = 94	66% (54%-77%) N = 59	60% (57%-63%) N = 755

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Don't Know	24% (22%-27%) N = 466	25% (14%-36%) N = 30	23% (10%-37%) N = 39	9% (3%-14%) N = 14	26% (23%-29%) N = 340
Refused	0% (0%-1%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	3% (0%-9%) N = 1	0% (0%-0%) N = 0
Q31. Have you ever heard the term low vision?					
Yes	16% (14%-18%) N = 462	22% (15%-29%) N = 44	10% (3%-16%) N = 37	27% (19%-35%) N = 46	14% (12%-16%) N = 296
No	83% (81%-85%) N = 2,676	77% (70%-84%) N = 226	89% (83%-96%) N = 264	73% (64%-81%) N = 125	85% (83%-87%) N = 1,811
Don't Know	1% (1%-2%) N = 40	1% (0%-2%) N = 3	1% (0%-2%) N = 4	1% (0%-2%) N = 1	1% (1%-2%) N = 26
Refused	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0
Q32. Have you ever been told by an eye care provider that you have low vision?					
Yes	2% (2%-3%) N = 76	3% (0%-6%) N = 9	1% (0%-2%) N = 6	2% (0%-4%) N = 4	2% (2%-3%) N = 52
No	97% (96%-98%) N = 3,079	96% (93%-99%) N = 261	96% (92%-100%) N = 294	98% (96%-100%) N = 168	97% (96%-98%) N = 2,069
Don't Know	1% (0%-1%) N = 22	1% (0%-2%) N = 3	3% (0%-7%) N = 5	0% (0%-0%) N = 0	1% (0%-1%) N = 11
Refused	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q33. Did your eye care provider ever recommend that you see a low vision specialist?					
Yes	31% (17%-45%) N = 23	31% (0%-69%) N = 4	30% (0%-69%) N = 2	23% (0%-65%) N = 1	30% (14%-47%) N = 14
No	69% (55%-83%) N = 52	69% (31%-100%) N = 5	70% (31%-100%) N = 4	77% (35%-100%) N = 3	69% (53%-85%) N = 37

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Don't Know	0% (0%-1%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	1% (0%-2%) N = 1
Q34. Have you ever seen a low vision specialist					
Yes	84% (65%-100%) N = 19	100% (100%-100%) N = 4	100% (100%-100%) N = 2	100% (100%-100%) N = 1	85% (63%-100%) N = 12
No	11% (0%-28%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	15% (0%-37%) N = 2
Don't Know	5% (0%-16%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0
Q35. What is the main reason you did not see a low vision specialist?					
I don't like doctors and avoid them	55% (0%-100%) N = 1				55% (0%-100%) N = 1
Other	0% (0%-0%) N = 1				0% (0%-0%) N = 0
Don't Know	45% (0%-100%) N = 1				45% (0%-100%) N = 1
Q36. Do you currently use any type of visual device for low vision such as a magnifier or telescope?					
Yes	10% (8%-11%) N = 381	5% (2%-7%) N = 29	7% (2%-13%) N = 35	5% (1%-8%) N = 10	11% (9%-12%) N = 280
No	90% (89%-91%) N = 2,790	95% (93%-98%) N = 244	93% (87%-98%) N = 270	95% (92%-99%) N = 161	89% (87%-90%) N = 1,849
Don't Know	0% (0%-0%) N = 6	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1	0% (0%-0%) N = 3
Refused	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q37. Did you get instruction on how to use this device?					
Yes	17% (11%-22%) N = 57	14% (0%-33%) N = 5	4% (0%-9%) N = 3	29% (0%-59%) N = 3	17% (11%-22%) N = 40
No	83% (78%-88%) N = 321	86% (67%-100%) N = 24	92% (81%-100%) N = 31	71% (41%-100%) N = 7	83% (77%-88%) N = 238
Don't Know	1% (0%-1%) N = 3	0% (0%-0%) N = 0	4% (0%-14%) N = 1	0% (0%-0%) N = 0	1% (0%-1%) N = 2
Q38. How important would you say the device is in your day-to-day activities?					
Very important	29% (23%-35%) N = 108	22% (0%-45%) N = 10	36% (0%-75%) N = 6	63% (29%-97%) N = 5	26% (20%-33%) N = 75
Somewhat important	26% (20%-32%) N = 102	31% (7%-56%) N = 9	15% (1%-29%) N = 12	14% (0%-36%) N = 3	27% (21%-34%) N = 73
Not too important	34% (27%-40%) N = 129	28% (0%-56%) N = 7	44% (5%-83%) N = 15	23% (0%-52%) N = 2	35% (28%-42%) N = 98
Not important at all	11% (7%-15%) N = 41	18% (0%-39%) N = 3	5% (0%-15%) N = 2	0% (0%-0%) N = 0	12% (7%-16%) N = 33
Don't Know	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q39a. Did you use any of the following assistive devices because of problems with your vision? Large print materials					
Yes	7% (6%-8%) N = 244	5% (2%-8%) N = 18	3% (0%-7%) N = 17	6% (2%-11%) N = 13	7% (6%-8%) N = 167
No	93% (91%-94%) N = 2,926	95% (92%-98%) N = 255	95% (89%-100%) N = 287	93% (89%-97%) N = 158	93% (91%-94%) N = 1,962
Don't Know	0% (0%-1%) N = 7	0% (0%-0%) N = 0	2% (0%-6%) N = 1	0% (0%-1%) N = 1	0% (0%-1%) N = 3

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Refused	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q39b. Did you use any of the following assistive devices because of problems with your vision? Talking books					
Yes	1% (1%-2%) N = 42	0% (0%-1%) N = 2	0% (0%-1%) N = 3	0% (0%-1%) N = 1	1% (1%-2%) N = 32
No	99% (98%-99%) N = 3,133	100% (99%-100%) N = 271	100% (99%-100%) N = 302	100% (99%-100%) N = 171	98% (98%-99%) N = 2,098
Don't Know	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 2
Refused	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q39c. Did you use any of the following assistive devices because of problems with your vision? Other talking items					
Yes	2% (1%-3%) N = 72	2% (0%-3%) N = 7	1% (0%-2%) N = 8	2% (0%-4%) N = 4	2% (1%-3%) N = 45
No	97% (97%-98%) N = 3,100	98% (97%-100%) N = 266	99% (98%-100%) N = 297	98% (96%-100%) N = 168	97% (96%-98%) N = 2,083
Don't Know	0% (0%-0%) N = 5	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 4
Refused	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q39d. Did you use any of the following assistive devices because of problems with your vision? A white cane					
Yes	1% (0%-1%) N = 22	1% (0%-2%) N = 3	0% (0%-0%) N = 2	1% (0%-3%) N = 2	1% (0%-1%) N = 14
No	99% (98%-99%) N = 3,153	98% (96%-100%) N = 269	100% (100%-100%) N = 303	99% (97%-100%) N = 170	99% (99%-100%) N = 2,117

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Don't Know	0% (0%-0%) N = 2	1% (0%-2%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Refused	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q39e. Did you use any of the following assistive devices because of problems with your vision? A computer adapted with large print screen or voice output					
Yes	2% (2%-3%) N = 69	2% (0%-4%) N = 6	3% (0%-7%) N = 7	4% (0%-8%) N = 5	2% (1%-3%) N = 42
No	97% (97%-98%) N = 3,096	98% (96%-100%) N = 267	97% (93%-100%) N = 295	96% (92%-100%) N = 167	98% (97%-99%) N = 2,082
Don't Know	0% (0%-0%) N = 12	0% (0%-0%) N = 0	0% (0%-1%) N = 3	0% (0%-0%) N = 0	0% (0%-1%) N = 8
Refused	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q39f. Did you use any of the following assistive devices because of problems with your vision? A guide dog					
Yes	0% (0%-0%) N = 12	0% (0%-1%) N = 2	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 7
No	99% (99%-100%) N = 3,163	100% (99%-100%) N = 271	100% (100%-100%) N = 304	100% (100%-100%) N = 172	100% (99%-100%) N = 2,124
Don't Know	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0
Refused	0% (0%-0%) N = 4	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 2

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q39g. Did you use any of the following assistive devices because of problems with your vision? Other adaptive device					
Yes	4% (3%-4%) N = 128	3% (1%-5%) N = 11	3% (0%-7%) N = 10	4% (1%-6%) N = 6	4% (3%-5%) N = 91
No	96% (95%-97%) N = 3,045	97% (95%-99%) N = 261	95% (90%-100%) N = 294	96% (94%-99%) N = 166	96% (95%-97%) N = 2,039
Don't Know	0% (0%-0%) N = 3	0% (0%-0%) N = 1	2% (0%-6%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Refused	0% (0%-0%) N = 4	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 2
Q40. Overall, how important would you say the device(s) are in your day-to-day activities?					
Very important	54% (47%-60%) N = 227	44% (19%-68%) N = 17	35% (1%-69%) N = 12	68% (45%-91%) N = 17	53% (46%-60%) N = 159
Somewhat important	20% (15%-25%) N = 86	33% (11%-54%) N = 11	29% (0%-63%) N = 10	17% (0%-37%) N = 4	18% (13%-24%) N = 52
Not too important	18% (13%-23%) N = 64	4% (0%-10%) N = 3	23% (0%-57%) N = 5	15% (0%-32%) N = 3	21% (15%-27%) N = 49
Not important at all	7% (4%-10%) N = 44	15% (0%-40%) N = 2	10% (0%-20%) N = 7	0% (0%-0%) N = 0	7% (4%-10%) N = 28
Don't Know	1% (0%-1%) N = 4	0% (0%-0%) N = 0	3% (0%-8%) N = 1	0% (0%-0%) N = 0	1% (0%-1%) N = 2
Refused	0% (0%-1%) N = 1	6% (0%-17%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q41a. During the past 12 months have you seen or heard anything about eye disease in magazines?					
Yes	19% (17%-21%) N = 603	10% (6%-14%) N = 35	21% (11%-31%) N = 46	14% (7%-21%) N = 23	21% (19%-23%) N = 457
No	81% (79%-83%) N = 2,303	90% (86%-94%) N = 229	79% (69%-89%) N = 228	86% (79%-93%) N = 141	79% (77%-81%) N = 1,483
Q41b. During the past 12 months have you seen or heard anything about eye disease in daily or weekly newspapers?					
Selected	7% (6%-8%) N = 243	3% (1%-6%) N = 11	4% (2%-6%) N = 26	9% (3%-14%) N = 13	8% (6%-9%) N = 177
Not selected	93% (92%-94%) N = 2,663	97% (94%-99%) N = 253	96% (94%-98%) N = 248	91% (86%-97%) N = 151	92% (91%-94%) N = 1,763
Q41c. During the past 12 months have you seen or heard anything about eye disease in educational pamphlets or brochures?					
Selected	4% (3%-5%) N = 91	4% (1%-8%) N = 10	5% (0%-11%) N = 6	5% (1%-8%) N = 8	3% (2%-4%) N = 62
Not selected	96% (95%-97%) N = 2,815	96% (92%-99%) N = 254	95% (89%-100%) N = 268	95% (92%-99%) N = 156	97% (96%-98%) N = 1,878
Q41d. During the past 12 months have you seen or heard anything about eye disease at the drugstore or supermarket?					
Selected	2% (1%-2%) N = 48	1% (0%-2%) N = 7	0% (0%-0%) N = 1	0% (0%-0%) N = 0	2% (1%-3%) N = 38
Not selected	98% (98%-99%) N = 2,858	99% (98%-100%) N = 257	100% (100%-100%) N = 273	100% (100%-100%) N = 164	98% (97%-99%) N = 1,902

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q41e. During the past 12 months have you seen or heard anything about eye disease in television programs or commercials?					
Selected	33% (30%-35%) N = 907	24% (17%-31%) N = 73	21% (11%-31%) N = 68	32% (23%-41%) N = 52	35% (32%-38%) N = 643
Not selected	67% (65%-70%) N = 1,999	76% (69%-83%) N = 191	79% (69%-89%) N = 206	68% (59%-77%) N = 112	65% (62%-68%) N = 1,297
Q41f. During the past 12 months have you seen or heard anything about eye disease in radio programs or commercials?					
Selected	6% (4%-7%) N = 146	2% (0%-4%) N = 6	5% (0%-11%) N = 10	5% (1%-9%) N = 7	6% (5%-8%) N = 115
Not selected	94% (93%-96%) N = 2,760	98% (96%-100%) N = 258	95% (89%-100%) N = 264	95% (91%-99%) N = 157	94% (92%-95%) N = 1,825
Q41g. During the past 12 months have you seen or heard anything about eye disease from religious or social organizations?					
Selected	0% (0%-1%) N = 12	0% (0%-0%) N = 0	0% (0%-1%) N = 2	0% (0%-0%) N = 0	0% (0%-1%) N = 9
Not selected	100% (99%-100%) N = 2,894	100% (100%-100%) N = 264	100% (99%-100%) N = 272	100% (100%-100%) N = 164	100% (99%-100%) N = 1,931
Q41h. During the past 12 months have you seen or heard anything about eye disease on the Internet?					
Selected	3% (3%-4%) N = 89	2% (0%-3%) N = 8	3% (0%-7%) N = 6	3% (0%-7%) N = 4	4% (3%-5%) N = 65
Not selected	97% (96%-97%) N = 2,817	98% (97%-100%) N = 256	97% (93%-100%) N = 268	97% (93%-100%) N = 160	96% (95%-97%) N = 1,875

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q41i. During the past 12 months have you seen or heard anything about eye disease at a doctor's office, clinic, or community health screening?					
Selected	23% (21%-26%) N = 721	17% (12%-23%) N = 56	19% (10%-28%) N = 58	21% (14%-29%) N = 38	25% (23%-27%) N = 504
Not selected	77% (74%-79%) N = 2,185	83% (77%-88%) N = 208	81% (72%-90%) N = 216	79% (71%-86%) N = 126	75% (73%-77%) N = 1,436
Q41j. During the past 12 months have you seen or heard anything about eye disease at your office or workplace?					
Selected	4% (3%-5%) N = 122	2% (0%-3%) N = 5	3% (0%-7%) N = 7	3% (0%-6%) N = 6	5% (4%-6%) N = 94
Not selected	96% (95%-97%) N = 2,784	98% (97%-100%) N = 259	97% (93%-100%) N = 267	97% (94%-100%) N = 158	95% (94%-96%) N = 1,846
Q41k. During the past 12 months have you seen or heard anything about eye disease from relatives or friends?					
Selected	6% (5%-7%) N = 159	5% (1%-8%) N = 14	4% (0%-8%) N = 7	3% (0%-5%) N = 6	7% (6%-9%) N = 119
Not selected	94% (93%-95%) N = 2,747	95% (92%-99%) N = 250	96% (92%-100%) N = 267	97% (95%-100%) N = 158	93% (91%-94%) N = 1,821
Q41l. During the past 12 months have you seen or heard anything about eye disease from a health information hotline?					
Selected	1% (0%-1%) N = 21	0% (0%-0%) N = 1	0% (0%-1%) N = 2	3% (0%-7%) N = 2	1% (0%-1%) N = 15
Not selected	99% (99%-100%) N = 2,885	100% (100%-100%) N = 263	100% (99%-100%) N = 272	97% (93%-100%) N = 162	99% (99%-100%) N = 1,925

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q41m. During the past 12 months have you seen or heard anything about eye disease from another source?					
Selected	7% (6%-8%) N = 181	8% (3%-12%) N = 18	8% (1%-14%) N = 15	9% (4%-15%) N = 13	6% (5%-8%) N = 120
Not selected	93% (92%-94%) N = 2,725	92% (88%-97%) N = 246	92% (86%-99%) N = 259	91% (85%-96%) N = 151	94% (92%-95%) N = 1,820
Q41n. During the past 12 months have you seen or heard nothing about eye disease?					
Selected	22% (20%-25%) N = 656	42% (34%-50%) N = 96	31% (20%-42%) N = 88	26% (18%-34%) N = 40	18% (16%-20%) N = 355
Not selected	78% (75%-80%) N = 2,250	58% (50%-66%) N = 168	69% (58%-80%) N = 186	74% (66%-82%) N = 124	82% (80%-84%) N = 1,585
Q42a. In the past 12 months, have you talked about eye health or eye disease with a health care provider who is not an eye care provider?					
Yes	15% (14%-17%) N = 546	11% (6%-15%) N = 39	14% (7%-21%) N = 47	23% (15%-31%) N = 37	15% (13%-17%) N = 368
No	84% (82%-86%) N = 2,620	89% (85%-94%) N = 234	82% (73%-90%) N = 255	77% (69%-85%) N = 135	85% (83%-87%) N = 1,759
Don't Know	0% (0%-1%) N = 9	0% (0%-0%) N = 0	4% (0%-10%) N = 3	0% (0%-0%) N = 0	0% (0%-1%) N = 4
Refused	0% (0%-0%) N = 5	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 2
Q42b. In the past 12 months, have you talked about eye health or eye disease with a pharmacist?					
Yes	2% (2%-3%) N = 79	2% (0%-3%) N = 8	8% (1%-15%) N = 6	0% (0%-1%) N = 2	2% (2%-3%) N = 53
No	97% (97%-98%) N = 3,096	98% (97%-100%) N = 265	92% (85%-99%) N = 299	100% (99%-100%) N = 170	98% (97%-98%) N = 2,078
Don't Know	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Refused	0% (0%-0%) N = 4	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q42c. In the past 12 months, have you talked about eye health or eye disease with a relative or friend?					
Yes	42% (40%-44%) N = 1,355	34% (26%-41%) N = 100	34% (23%-45%) N = 94	40% (31%-49%) N = 70	44% (42%-47%) N = 979
No	57% (55%-60%) N = 1,810	66% (59%-74%) N = 173	66% (55%-77%) N = 211	60% (51%-69%) N = 102	55% (52%-58%) N = 1,146
Don't Know	0% (0%-1%) N = 11	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-1%) N = 7
Refused	0% (0%-0%) N = 4	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q42d. In the past 12 months, have you talked about eye health or eye disease with an eye care provider?					
Yes	41% (39%-43%) N = 1,481	23% (17%-30%) N = 87	42% (31%-53%) N = 139	37% (28%-45%) N = 73	45% (42%-48%) N = 1,064
No	59% (56%-61%) N = 1,689	77% (70%-83%) N = 186	58% (47%-69%) N = 164	63% (55%-72%) N = 99	55% (52%-57%) N = 1,064
Don't Know	0% (0%-0%) N = 5	0% (0%-0%) N = 0	0% (0%-1%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 3
Refused	0% (0%-0%) N = 5	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 2
Q42e. In the past 12 months, have you talked about eye health or eye disease with a co-worker/employer?					
Yes	15% (13%-17%) N = 490	10% (6%-15%) N = 36	13% (6%-21%) N = 47	17% (10%-24%) N = 29	15% (14%-17%) N = 339
No	85% (83%-86%) N = 2,673	89% (85%-94%) N = 236	86% (79%-93%) N = 255	83% (76%-90%) N = 142	84% (82%-86%) N = 1,785

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Don't Know	0% (0%-0%) N = 9	0% (0%-1%) N = 1	1% (0%-1%) N = 3	0% (0%-1%) N = 1	0% (0%-0%) N = 4
Refused	0% (0%-1%) N = 8	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 5
Q42f. In the past 12 months, have you talked about eye health or eye disease with anyone else?					
Yes	3% (2%-4%) N = 101	3% (0%-6%) N = 8	3% (0%-7%) N = 10	4% (1%-8%) N = 8	3% (2%-4%) N = 68
No	96% (95%-97%) N = 3,057	97% (94%-100%) N = 264	97% (93%-100%) N = 295	96% (92%-99%) N = 164	97% (96%-98%) N = 2,051
Don't Know	0% (0%-1%) N = 17	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	1% (0%-1%) N = 13
Refused	0% (0%-0%) N = 5	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q43. Do you have any kind of health care coverage?					
Yes	79% (77%-81%) N = 2,708	55% (47%-63%) N = 189	81% (72%-91%) N = 280	81% (73%-88%) N = 143	83% (81%-85%) N = 1,852
No	20% (18%-22%) N = 438	44% (36%-52%) N = 83	18% (8%-27%) N = 22	19% (12%-27%) N = 29	16% (14%-18%) N = 265
Don't Know	1% (0%-1%) N = 17	1% (0%-2%) N = 1	1% (0%-2%) N = 3	0% (0%-0%) N = 0	1% (0%-1%) N = 10
Refused	1% (0%-1%) N = 17	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 6
Q44a. Are you covered by Medicare?					
Yes	24% (22%-26%) N = 734	23% (14%-31%) N = 48	18% (9%-27%) N = 67	25% (16%-33%) N = 42	25% (22%-27%) N = 519

Response	Everyone aged 18+	Hispanic	Asian	Black	White
No	76% (74%-78%) N = 1,974	77% (69%-86%) N = 141	82% (73%-91%) N = 213	75% (67%-84%) N = 101	75% (73%-78%) N = 1,333
Q44b. Are you covered by Medicaid?					
Yes	7% (6%-9%) N = 158	15% (7%-23%) N = 22	7% (0%-13%) N = 8	15% (8%-22%) N = 22	5% (4%-6%) N = 87
No	93% (91%-94%) N = 2,550	85% (77%-93%) N = 167	93% (87%-100%) N = 272	85% (78%-92%) N = 121	95% (94%-96%) N = 1,765
Q44c. Are you covered by military health insurance?					
Yes	4% (3%-5%) N = 132	3% (0%-5%) N = 9	2% (1%-3%) N = 14	7% (2%-13%) N = 11	4% (3%-5%) N = 89
No	96% (95%-97%) N = 2,576	97% (95%-100%) N = 180	98% (97%-99%) N = 266	93% (87%-98%) N = 132	96% (95%-97%) N = 1,763
Q44d. Are you covered by private health insurance?					
Yes	71% (68%-73%) N = 1,905	60% (49%-70%) N = 117	75% (65%-85%) N = 202	64% (55%-74%) N = 89	74% (71%-76%) N = 1,351
No	29% (27%-32%) N = 803	40% (30%-51%) N = 72	25% (15%-35%) N = 78	36% (26%-45%) N = 54	26% (24%-29%) N = 501
Q44e. Are you covered by some other health insurance?					
Yes	2% (1%-3%) N = 66	4% (0%-9%) N = 7	4% (0%-8%) N = 7	0% (0%-0%) N = 0	2% (1%-3%) N = 37
No	98% (97%-99%) N = 2,642	96% (91%-100%) N = 182	96% (92%-100%) N = 273	100% (100%-100%) N = 143	98% (97%-99%) N = 1,815
Q44f. Not sure of insurance type.					
Yes	2% (1%-3%) N = 46	3% (0%-7%) N = 5	2% (0%-5%) N = 8	1% (0%-4%) N = 1	1% (1%-2%) N = 17
No	98% (97%-99%) N = 2,662	97% (93%-100%) N = 184	98% (95%-100%) N = 272	99% (96%-100%) N = 142	99% (98%-99%) N = 1,835

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q44g. Refused insurance type.					
Yes	1% (0%-1%) N = 15	0% (0%-0%) N = 1	0% (0%-1%) N = 1	2% (0%-5%) N = 1	0% (0%-1%) N = 8
No	99% (99%-100%) N = 2,693	100% (100%-100%) N = 188	100% (99%-100%) N = 279	98% (95%-100%) N = 142	100% (99%-100%) N = 1,844
Q45. How much of the cost of a regular exam provided by an eye care provider is covered by your health care coverage?					
All	29% (27%-31%) N = 786	31% (21%-41%) N = 56	24% (14%-35%) N = 67	30% (21%-39%) N = 45	29% (26%-31%) N = 539
Part	38% (35%-40%) N = 1,063	43% (32%-53%) N = 85	41% (29%-53%) N = 132	43% (33%-53%) N = 59	37% (34%-40%) N = 698
None	17% (15%-19%) N = 415	11% (5%-17%) N = 18	8% (1%-16%) N = 13	7% (2%-12%) N = 10	19% (17%-22%) N = 355
Don't Know	16% (14%-18%) N = 434	15% (7%-23%) N = 30	27% (16%-37%) N = 67	20% (12%-28%) N = 29	14% (12%-17%) N = 254
Refused	0% (0%-1%) N = 10	0% (0%-0%) N = 0	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-1%) N = 6
Q46. Does your health care coverage pay for any part of the cost of glasses or contact lenses?					
Yes	51% (49%-54%) N = 1,425	59% (48%-69%) N = 118	62% (50%-73%) N = 197	65% (55%-74%) N = 94	48% (45%-51%) N = 874
No	37% (35%-40%) N = 1,016	29% (20%-39%) N = 57	28% (16%-39%) N = 54	19% (12%-27%) N = 30	42% (39%-45%) N = 807
Don't Know	11% (9%-13%) N = 263	12% (5%-19%) N = 14	11% (4%-18%) N = 28	16% (8%-24%) N = 19	10% (8%-12%) N = 170
Refused	0% (0%-0%) N = 4	0% (0%-0%) N = 0	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 1

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q47. Does your health care coverage pay for any part of visual devices that are prescribed by an eye care professional?					
Yes	15% (13%-17%) N = 372	22% (13%-32%) N = 39	14% (6%-22%) N = 42	26% (17%-35%) N = 36	13% (11%-15%) N = 208
No	40% (38%-43%) N = 1,084	37% (27%-47%) N = 68	41% (29%-53%) N = 93	30% (21%-39%) N = 39	42% (39%-45%) N = 804
Don't Know	45% (42%-48%) N = 1,248	40% (30%-50%) N = 82	45% (33%-57%) N = 145	44% (34%-53%) N = 68	45% (43%-48%) N = 839
Refused	0% (0%-0%) N = 4	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
Q48. What is the last grade in school you completed?					
Some high school or less	19% (17%-21%) N = 336	42% (34%-50%) N = 71	8% (2%-14%) N = 19	20% (13%-28%) N = 26	15% (13%-17%) N = 178
High school diploma or equivalent	29% (27%-31%) N = 962	28% (21%-34%) N = 85	15% (8%-22%) N = 61	34% (26%-43%) N = 54	29% (27%-32%) N = 653
Some college	28% (26%-30%) N = 776	18% (12%-24%) N = 58	40% (29%-51%) N = 88	27% (19%-35%) N = 42	30% (27%-32%) N = 532
Four year college degree	13% (12%-15%) N = 629	7% (4%-11%) N = 41	23% (13%-32%) N = 89	11% (6%-15%) N = 33	14% (13%-16%) N = 421
Graduate school started or completed	9% (8%-11%) N = 437	4% (1%-7%) N = 15	11% (4%-18%) N = 44	6% (3%-10%) N = 16	11% (10%-12%) N = 335
Don't Know	1% (0%-1%) N = 17	0% (0%-1%) N = 3	2% (0%-6%) N = 4	0% (0%-0%) N = 0	0% (0%-1%) N = 8
Refused	1% (0%-1%) N = 23	0% (0%-0%) N = 0	0% (0%-0%) N = 0	1% (0%-4%) N = 1	0% (0%-0%) N = 6

Response	Everyone aged 18+	Hispanic	Asian	Black	White
Q49. Are you currently...					
Married	60% (57%-62%) N = 1,759	64% (56%-72%) N = 160	61% (51%-72%) N = 169	32% (24%-41%) N = 48	64% (61%-66%) N = 1,237
Divorced or separated	11% (10%-13%) N = 466	11% (6%-16%) N = 43	6% (1%-12%) N = 31	15% (9%-21%) N = 38	11% (10%-13%) N = 321
Widowed	6% (5%-7%) N = 330	2% (1%-3%) N = 12	6% (1%-12%) N = 30	7% (3%-10%) N = 16	7% (6%-8%) N = 250
Single	22% (20%-24%) N = 596	23% (16%-31%) N = 57	26% (16%-35%) N = 72	46% (37%-55%) N = 69	17% (15%-20%) N = 318
Refused	1% (0%-1%) N = 29	0% (0%-1%) N = 1	0% (0%-1%) N = 3	0% (0%-1%) N = 1	0% (0%-0%) N = 7
Q50. How many adults and children presently live in your household, counting yourself					
Lives Alone	15% (13%-16%) N = 772	5% (3%-8%) N = 39	16% (7%-25%) N = 50	25% (18%-32%) N = 63	15% (13%-16%) N = 569
2	32% (30%-34%) N = 1,085	20% (15%-26%) N = 72	20% (11%-29%) N = 80	27% (19%-34%) N = 48	36% (33%-38%) N = 794
3	18% (16%-19%) N = 457	15% (10%-21%) N = 44	20% (11%-28%) N = 62	20% (13%-28%) N = 27	18% (16%-20%) N = 290
4	19% (17%-21%) N = 466	25% (18%-32%) N = 51	20% (11%-29%) N = 50	14% (7%-21%) N = 16	19% (17%-22%) N = 306
5	9% (7%-10%) N = 198	18% (11%-24%) N = 38	10% (4%-17%) N = 26	7% (2%-12%) N = 10	8% (6%-9%) N = 103
6	4% (3%-5%) N = 88	11% (6%-17%) N = 19	4% (0%-8%) N = 12	4% (0%-8%) N = 5	3% (2%-4%) N = 39
7	1% (1%-2%) N = 33	4% (0%-7%) N = 7	2% (0%-4%) N = 6	1% (0%-4%) N = 1	1% (0%-2%) N = 13

Response	Everyone aged 18+	Hispanic	Asian	Black	White
8	0% (0%-1%) N = 17	1% (0%-3%) N = 2	4% (0%-8%) N = 7	0% (0%-0%) N = 0	0% (0%-0%) N = 3
9	0% (0%-0%) N = 9	0% (0%-0%) N = 0	1% (0%-3%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 2
10	0% (0%-1%) N = 9	0% (0%-0%) N = 0	1% (0%-2%) N = 2	0% (0%-0%) N = 0	0% (0%-1%) N = 2
11	0% (0%-0%) N = 4	0% (0%-0%) N = 1	0% (0%-1%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0
12	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0
15	0% (0%-0%) N = 3	0% (0%-0%) N = 0	1% (0%-2%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0
Refused	1% (1%-2%) N = 36	0% (0%-0%) N = 0	0% (0%-0%) N = 3	2% (0%-4%) N = 2	0% (0%-0%) N = 12
Q51a. May I have your age as of your last birthday?					
Refused	2% (2%-3%) N = 98	1% (0%-2%) N = 4	6% (0%-11%) N = 15	1% (0%-2%) N = 1	2% (1%-2%) N = 44
18	3% (2%-4%) N = 40	1% (0%-3%) N = 4	5% (0%-9%) N = 8	4% (0%-8%) N = 3	3% (1%-4%) N = 19
19	2% (1%-2%) N = 24	2% (0%-5%) N = 3	1% (0%-3%) N = 3	2% (0%-4%) N = 3	2% (1%-2%) N = 14
20	1% (1%-2%) N = 20	1% (0%-2%) N = 2	0% (0%-1%) N = 2	4% (0%-9%) N = 3	1% (0%-2%) N = 10
21	1% (0%-2%) N = 16	1% (0%-3%) N = 3	3% (0%-7%) N = 4	2% (0%-5%) N = 2	1% (0%-1%) N = 5
22	2% (1%-3%) N = 33	3% (0%-7%) N = 4	1% (0%-1%) N = 2	0% (0%-1%) N = 1	2% (1%-3%) N = 17

Response	Everyone aged 18+	Hispanic	Asian	Black	White
23	1% (1%-2%) N = 21	2% (0%-4%) N = 5	0% (0%-0%) N = 0	3% (0%-6%) N = 3	1% (0%-1%) N = 10
24	2% (1%-2%) N = 26	6% (2%-11%) N = 8	0% (0%-1%) N = 1	1% (0%-3%) N = 3	1% (0%-2%) N = 11
25	2% (1%-3%) N = 44	3% (0%-5%) N = 8	2% (0%-6%) N = 2	3% (0%-6%) N = 6	2% (1%-2%) N = 21
26	1% (1%-2%) N = 31	1% (0%-3%) N = 4	1% (0%-3%) N = 3	0% (0%-1%) N = 1	1% (1%-2%) N = 23
27	2% (1%-2%) N = 42	3% (0%-6%) N = 6	0% (0%-1%) N = 2	2% (0%-4%) N = 3	1% (1%-2%) N = 25
28	2% (1%-3%) N = 40	3% (0%-6%) N = 3	5% (0%-10%) N = 6	0% (0%-1%) N = 1	2% (1%-3%) N = 24
29	2% (1%-2%) N = 44	1% (0%-2%) N = 4	1% (0%-2%) N = 2	2% (0%-4%) N = 4	2% (1%-2%) N = 28
30	2% (1%-3%) N = 44	7% (2%-12%) N = 9	1% (0%-1%) N = 4	3% (0%-6%) N = 5	1% (1%-2%) N = 22
31	2% (1%-3%) N = 47	3% (0%-6%) N = 7	6% (0%-13%) N = 8	2% (0%-4%) N = 2	2% (1%-2%) N = 26
32	2% (1%-3%) N = 57	5% (1%-8%) N = 9	1% (0%-3%) N = 5	1% (0%-3%) N = 3	2% (1%-3%) N = 33
33	2% (2%-3%) N = 49	4% (1%-7%) N = 8	2% (0%-6%) N = 2	3% (0%-7%) N = 3	2% (1%-3%) N = 29
34	2% (1%-3%) N = 47	3% (1%-5%) N = 9	1% (0%-2%) N = 4	2% (0%-4%) N = 4	2% (1%-3%) N = 27
35	2% (2%-3%) N = 57	4% (1%-7%) N = 9	0% (0%-1%) N = 2	2% (0%-5%) N = 2	2% (1%-3%) N = 38

Response	Everyone aged 18+	Hispanic	Asian	Black	White
36	2% (1%-2%) N = 49	2% (0%-4%) N = 7	5% (0%-10%) N = 7	4% (0%-7%) N = 4	1% (1%-2%) N = 27
37	2% (1%-2%) N = 58	0% (0%-1%) N = 3	5% (0%-10%) N = 8	2% (0%-5%) N = 3	2% (1%-2%) N = 34
38	2% (1%-3%) N = 50	2% (0%-5%) N = 4	0% (0%-1%) N = 3	1% (0%-2%) N = 1	2% (1%-3%) N = 39
39	2% (1%-3%) N = 55	3% (0%-6%) N = 5	1% (0%-3%) N = 5	1% (0%-3%) N = 2	2% (1%-3%) N = 40
40	2% (2%-3%) N = 59	4% (1%-8%) N = 11	1% (0%-1%) N = 4	3% (0%-6%) N = 6	2% (1%-3%) N = 36
41	3% (2%-4%) N = 59	3% (0%-7%) N = 5	0% (0%-0%) N = 2	3% (0%-6%) N = 4	3% (2%-4%) N = 44
42	2% (2%-3%) N = 67	4% (1%-7%) N = 8	0% (0%-1%) N = 5	2% (0%-5%) N = 2	2% (1%-3%) N = 45
43	2% (1%-3%) N = 52	2% (0%-5%) N = 5	3% (0%-7%) N = 7	2% (0%-4%) N = 3	2% (1%-3%) N = 29
44	2% (1%-3%) N = 46	1% (0%-3%) N = 4	3% (0%-7%) N = 7	1% (0%-4%) N = 1	2% (1%-3%) N = 33
45	2% (2%-3%) N = 83	1% (0%-3%) N = 4	7% (0%-13%) N = 12	5% (1%-9%) N = 6	2% (2%-3%) N = 55
46	2% (1%-2%) N = 62	1% (0%-2%) N = 3	4% (0%-9%) N = 4	2% (0%-5%) N = 3	2% (1%-3%) N = 45
47	2% (1%-2%) N = 65	2% (0%-3%) N = 6	2% (0%-6%) N = 7	1% (0%-3%) N = 2	2% (1%-3%) N = 46
48	1% (1%-2%) N = 59	2% (0%-3%) N = 5	1% (0%-1%) N = 7	1% (0%-2%) N = 3	2% (1%-2%) N = 42

Response	Everyone aged 18+	Hispanic	Asian	Black	White
49	2% (1%-2%) N = 72	1% (0%-3%) N = 9	1% (0%-2%) N = 10	1% (0%-3%) N = 1	2% (1%-2%) N = 49
50	2% (1%-3%) N = 69	1% (0%-2%) N = 4	1% (0%-2%) N = 8	4% (1%-7%) N = 7	2% (1%-3%) N = 47
51	2% (1%-2%) N = 59	1% (0%-1%) N = 3	1% (0%-2%) N = 9	2% (0%-4%) N = 2	2% (1%-2%) N = 39
52	2% (1%-3%) N = 70	0% (0%-1%) N = 1	0% (0%-1%) N = 5	2% (0%-5%) N = 6	2% (2%-3%) N = 58
53	2% (1%-2%) N = 59	1% (0%-2%) N = 5	2% (0%-6%) N = 5	3% (0%-5%) N = 6	2% (1%-2%) N = 38
54	2% (1%-2%) N = 67	1% (0%-2%) N = 4	0% (0%-1%) N = 3	3% (0%-6%) N = 6	2% (1%-2%) N = 50
55	1% (1%-2%) N = 64	0% (0%-1%) N = 4	1% (0%-1%) N = 5	1% (0%-3%) N = 2	2% (1%-2%) N = 47
56	1% (1%-1%) N = 49	0% (0%-0%) N = 2	1% (0%-1%) N = 3	1% (0%-4%) N = 2	1% (1%-2%) N = 35
57	1% (1%-2%) N = 62	2% (0%-4%) N = 5	2% (0%-6%) N = 5	1% (0%-2%) N = 2	2% (1%-2%) N = 47
58	1% (1%-2%) N = 62	0% (0%-1%) N = 6	0% (0%-1%) N = 4	1% (0%-1%) N = 3	1% (1%-2%) N = 43
59	1% (1%-1%) N = 45	0% (0%-0%) N = 1	1% (0%-1%) N = 7	0% (0%-1%) N = 1	1% (1%-1%) N = 33
60	1% (1%-2%) N = 65	0% (0%-1%) N = 4	0% (0%-1%) N = 5	2% (0%-5%) N = 6	2% (1%-2%) N = 45
61	1% (1%-2%) N = 58	0% (0%-1%) N = 2	4% (0%-10%) N = 6	0% (0%-1%) N = 1	2% (1%-2%) N = 45

Response	Everyone aged 18+	Hispanic	Asian	Black	White
62	1% (0%-1%) N = 35	0% (0%-1%) N = 3	0% (0%-0%) N = 1	0% (0%-1%) N = 1	1% (1%-1%) N = 27
63	1% (1%-2%) N = 46	1% (0%-2%) N = 3	0% (0%-0%) N = 0	1% (0%-1%) N = 2	1% (1%-2%) N = 37
64	1% (1%-1%) N = 40	0% (0%-1%) N = 2	0% (0%-0%) N = 3	1% (0%-2%) N = 3	1% (1%-1%) N = 29
65	1% (1%-2%) N = 44	0% (0%-1%) N = 2	2% (0%-6%) N = 5	2% (0%-5%) N = 4	1% (1%-2%) N = 31
66	1% (1%-1%) N = 39	0% (0%-1%) N = 3	0% (0%-1%) N = 3	1% (0%-3%) N = 3	1% (1%-1%) N = 26
67	1% (1%-2%) N = 49	1% (0%-2%) N = 2	4% (0%-10%) N = 7	1% (0%-2%) N = 3	1% (1%-2%) N = 30
68	1% (1%-1%) N = 39	1% (0%-2%) N = 4	0% (0%-0%) N = 1	0% (0%-1%) N = 1	1% (1%-1%) N = 30
69	1% (1%-2%) N = 47	0% (0%-0%) N = 1	0% (0%-0%) N = 1	2% (0%-3%) N = 6	2% (1%-2%) N = 37
70	1% (1%-1%) N = 40	0% (0%-1%) N = 3	2% (0%-6%) N = 3	0% (0%-0%) N = 0	1% (1%-1%) N = 29
71	1% (0%-1%) N = 37	0% (0%-0%) N = 4	1% (0%-2%) N = 5	0% (0%-0%) N = 0	1% (1%-2%) N = 27
72	1% (0%-1%) N = 30	0% (0%-0%) N = 2	0% (0%-0%) N = 1	0% (0%-0%) N = 0	1% (0%-1%) N = 24
73	1% (0%-1%) N = 37	1% (0%-2%) N = 1	0% (0%-1%) N = 5	0% (0%-0%) N = 1	1% (0%-1%) N = 23
74	1% (0%-1%) N = 29	1% (0%-2%) N = 3	1% (0%-1%) N = 5	1% (0%-1%) N = 2	1% (0%-1%) N = 16

Response	Everyone aged 18+	Hispanic	Asian	Black	White
75	1% (1%-2%) N = 43	0% (0%-0%) N = 0	1% (0%-1%) N = 5	2% (0%-5%) N = 3	1% (1%-2%) N = 34
76	0% (0%-0%) N = 19	0% (0%-1%) N = 2	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-1%) N = 12
77	1% (1%-1%) N = 34	0% (0%-0%) N = 1	0% (0%-0%) N = 2	0% (0%-1%) N = 1	1% (1%-2%) N = 29
78	1% (0%-1%) N = 27	0% (0%-0%) N = 1	3% (0%-6%) N = 7	0% (0%-1%) N = 2	1% (0%-1%) N = 16
79	0% (0%-1%) N = 27	0% (0%-1%) N = 1	0% (0%-1%) N = 1	0% (0%-1%) N = 1	1% (0%-1%) N = 23
80	0% (0%-1%) N = 24	0% (0%-0%) N = 0	1% (0%-1%) N = 7	0% (0%-0%) N = 0	1% (0%-1%) N = 17
81	1% (0%-1%) N = 27	0% (0%-1%) N = 1	0% (0%-1%) N = 3	1% (0%-2%) N = 1	1% (0%-1%) N = 20
82	0% (0%-0%) N = 20	0% (0%-0%) N = 0	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-1%) N = 16
83	0% (0%-1%) N = 16	1% (0%-2%) N = 4	0% (0%-0%) N = 2	0% (0%-0%) N = 0	0% (0%-1%) N = 10
84	1% (0%-1%) N = 22	0% (0%-0%) N = 0	0% (0%-0%) N = 2	0% (0%-0%) N = 0	1% (0%-1%) N = 20
85	0% (0%-1%) N = 21	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	1% (0%-1%) N = 20
86	0% (0%-0%) N = 10	0% (0%-0%) N = 0	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-1%) N = 7
87	0% (0%-0%) N = 8	0% (0%-0%) N = 0	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 7

Response	Everyone aged 18+	Hispanic	Asian	Black	White
88	0% (0%-0%) N = 10	0% (0%-0%) N = 0	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 9
89	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
90	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-1%) N = 3
91	0% (0%-0%) N = 3	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 3
92	0% (0%-0%) N = 2	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
96	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
97	0% (0%-0%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 1
99	0% (0%-1%) N = 4	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0
Q51b. Which one of the following categories best represents your age as of your last birthday?					
18-24	1% (0%-3%) N = 1	0% (0%-0%) N = 0	11% (0%-33%) N = 1	0% (0%-0%) N = 0	0% (0%-0%) N = 0
25-34	5% (0%-11%) N = 6	0% (0%-0%) N = 2	0% (0%-0%) N = 0	100% (100%-100%) N = 1	7% (0%-15%) N = 3
35-44	9% (2%-15%) N = 9	0% (0%-0%) N = 0	9% (0%-24%) N = 2	0% (0%-0%) N = 0	17% (3%-31%) N = 7
45-54	9% (2%-16%) N = 14	0% (0%-0%) N = 0	34% (0%-83%) N = 4	0% (0%-0%) N = 0	13% (2%-24%) N = 7

Response	Everyone aged 18+	Hispanic	Asian	Black	White
55-64	9% (1%-17%) N = 11	100% (100%-100%) N = 2	0% (0%-0%) N = 0	0% (0%-0%) N = 0	13% (0%-27%) N = 7
65-74	14% (4%-24%) N = 13	0% (0%-0%) N = 0	34% (0%-83%) N = 2	0% (0%-0%) N = 0	12% (2%-22%) N = 6
75+	4% (0%-8%) N = 5	0% (0%-0%) N = 0	2% (0%-7%) N = 2	0% (0%-0%) N = 0	4% (0%-9%) N = 2
Refused	49% (35%-63%) N = 39	0% (0%-0%) N = 0	10% (0%-23%) N = 4	0% (0%-0%) N = 0	34% (16%-52%) N = 12
Q54. What is your total household income before taxes in 2004?					
Less than \$10,000	9% (7%-10%) N = 239	14% (9%-19%) N = 37	3% (0%-7%) N = 11	18% (11%-25%) N = 31	6% (5%-8%) N = 126
\$10,000 to \$14,999	7% (6%-8%) N = 211	13% (8%-19%) N = 32	3% (0%-7%) N = 10	10% (4%-16%) N = 15	6% (5%-7%) N = 132
\$15,000 to \$24,999	10% (8%-11%) N = 303	17% (11%-24%) N = 34	7% (1%-14%) N = 19	12% (6%-18%) N = 23	9% (7%-10%) N = 205
\$25,000 to \$34,999	11% (9%-12%) N = 341	13% (7%-18%) N = 37	8% (2%-13%) N = 30	13% (7%-20%) N = 24	11% (9%-12%) N = 221
\$35,000 to \$49,999	12% (10%-13%) N = 402	9% (5%-13%) N = 31	7% (2%-12%) N = 33	13% (7%-19%) N = 26	13% (11%-14%) N = 273
\$50,000 to \$74,999	16% (14%-17%) N = 507	7% (3%-10%) N = 23	26% (16%-36%) N = 62	11% (5%-17%) N = 17	18% (16%-20%) N = 363
\$75,000 to \$99,999	10% (9%-12%) N = 312	4% (1%-6%) N = 20	10% (3%-16%) N = 33	7% (3%-12%) N = 12	12% (10%-14%) N = 235
\$100,000 to \$149,999	7% (6%-8%) N = 241	3% (1%-5%) N = 10	6% (1%-12%) N = 25	2% (0%-5%) N = 6	8% (7%-10%) N = 181

Response	Everyone aged 18+	Hispanic	Asian	Black	White
\$150,000 to \$199,999	2% (1%-2%) N = 55	1% (0%-2%) N = 1	5% (0%-10%) N = 7	0% (0%-0%) N = 0	2% (1%-3%) N = 44
\$200,000 or more	2% (1%-2%) N = 46	2% (0%-5%) N = 2	4% (0%-9%) N = 5	2% (0%-4%) N = 2	1% (1%-2%) N = 34
Don't Know	5% (4%-6%) N = 157	12% (7%-16%) N = 29	9% (4%-14%) N = 31	1% (0%-4%) N = 2	4% (3%-5%) N = 71
Refused	11% (9%-12%) N = 366	6% (2%-10%) N = 17	12% (5%-19%) N = 39	9% (4%-15%) N = 14	10% (9%-12%) N = 248
Q55. Please tell me your gender					
Male	47% (45%-50%) N = 1,249	53% (45%-61%) N = 111	41% (31%-52%) N = 129	44% (35%-53%) N = 65	48% (45%-50%) N = 830
Female	52% (50%-54%) N = 1,919	47% (39%-55%) N = 162	59% (48%-69%) N = 176	56% (47%-65%) N = 107	52% (50%-55%) N = 1,301
Refused	1% (0%-1%) N = 12	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 0	0% (0%-0%) N = 2

APPENDIX D

Qualifications of Interviewers

Survey Staff

ORC Macro places a high value on the recruitment, qualifications, and monitoring of the field and telephone interviewing staff. This section outlines the strategies and standards that ORC Macro employs to ensure the consistent, accurate, and professional administration of surveys by the interviewers.

Interviewer recruitment

ORC Macro has an ongoing organizational commitment to interviewer recruitment. Continuous recruitment is necessary to accommodate growth in the contracted workload and to keep pace with the normal turnover that occurs in a large workforce.

To accomplish this goal, ORC Macro remains in contact with the local market and maintains a database of available interviewers, enabling us to respond quickly to sudden increases in business volume or a need for special skills on short notice. ORC Macro's continual interviewer recruitment process is managed by a full-time team that includes a full-time human resources manager, the data collection manager, a payroll supervisor, and a team of experienced interviewing supervisors located at the Plattsburgh, New York CATI Research Center. Telephone and field interviewers are recruited through the local daily and weekly newspapers, the college newspapers, and regular job fairs in the immediate vicinity. The CATI Research Center's human resource manager also works closely with the Employment Services Office of the Vermont Department of Labor and New York Department of Labor.

Interviewer qualifications

Prospective interviewers must meet three criteria before becoming part of ORC Macro's interviewing staff:

- **A minimum high school-level educational standing.** While ORC Macro's interviewers must meet minimum high school education standards, many of them exceed this requirement. ORC Macro's long-term recruiting strategy includes targeting local colleges with programs and courses in specific fields related to ORC Macro's survey research projects. The CATI Operations Manager develops relationships with college advisors and program administrators in an effort to obtain interviewers experienced in fields such as counseling, community development, nursing, nutritional sciences, public health, psychology, and social work. Interviewers with this type of background are considered highly eligible for public health survey projects.
- **Communication skills.** Interviewers must exhibit good communication skills and, in order to be hired, must first attend a job interview that seeks to evaluate their abilities in this area. A prospective employee's performance in the initial interview is generally a good indicator of his or her future performance as a survey interviewer. During this interview, each applicant completes a brief spelling and keyboarding test, reads a standard diagnostic text, and is asked to participate in several role-playing exercises. These mock interviews involve hypothetical interviews with the recruiter following pre-arranged scenarios. During the initial

recruitment interview, recruiters assess the applicant's overall ability to understand, retain and follow complex instruction information related to completing a survey. All interviewers must have a thorough command of the English language; additional languages are considered highly desirable as well. Bilingual interviewers may be specifically recruited to work on surveys administered in languages other than English.

- **Professional manner.** Good interviewers are persuasive, patient, calm, compassionate, optimistic, and empathetic. They must maintain a positive, fresh approach in a job that is repetitive in nature. They must remain alert and focused. They must also remain calm and courteous in the face of potential objections or outright rejection by respondents. ORC Macro is fully aware of the importance of these qualities in a strong interviewing staff and works diligently to achieve them in the recruitment, hiring, and retention.

General Training

Following recruitment, ORC Macro's telephone interviewers receive initial training consisting of the Computer Assisted Telephone Interviewing (CATI) program training, interview protocol training, and administrative issues before they participate in project-specific training.

General training takes place over two days. The first day of general training introduces interviewers to survey research, the role of the interviewer, and the CATI or Computer Assisted Personal Interviewing (CAPI) system, and covers several topics in a 4-hour session. These topics are overviews of: survey research techniques, telephone and field surveys, CATI and CAPI systems, the role of the interviewer in survey research, types of samples, types of respondents, determining household and respondent eligibility, and administrative issues. These sessions also cover interviewing techniques: question reading, entering responses, probing for responses, the use of appropriate feedback, and avoiding refusals.

The second day of general training combines more advanced discussion of interviewing techniques with practice interviewing, monitored interviewing with supervisors and senior interviewers, and monitored live calling. Supervisors review interviewing techniques for handling difficult respondents, probing for answers in difficult situations, and the proper enumeration of eligible adults residing in a household at the time of contact. Following this discussion, interviewers conduct practice interviews with one another, and interviews are monitored by a supervisor or senior interviewer, who introduces them to different situations that may arise during an interview. Interviewers who receive satisfactory monitoring scores are then allowed to conduct live calling on a practice project. Successful completion of practice calling means that an interviewer can be scheduled for a project-specific training session.

Structured survey experience

After receiving general and project-specific training, ORC Macro interviewers gain hands-on experience in a way that is structured to teach them specific skills in order of importance. For example, interviewers typically begin by conducting interviews for our Fair Market Rent surveys (FMR) for the Department of Housing and Urban Development (HUD). These surveys are short

and relatively simple instruments designed to gather information about rental housing in areas where HUD provides housing subsidies; more importantly, the target population, rental households in primarily urban areas, tends to consist heavily of lower-income households receiving subsidies. As a result, interviewers receive initial experience in conducting a relatively simple interview among a relatively challenging population, an experience that serves to raise interviewer confidence in handling more difficult surveys later in their careers. ORC Macro interviewers who demonstrate superior interviewing skills are elevated to more complex projects, such as the KAP.

The interviewers who worked on the 2005 KAP survey have met minimum standards with respect to tenure, response rate, non-response conversion capabilities, and interview performance based on monitoring sessions. Many have worked continuously at ORC Macro for three to five years.

APPENDIX E

Confidentiality Agreement

Statement of Policy

ORC Macro is firmly committed to the principle that the confidentiality of individual data obtained through ORC Macro surveys must be protected. This principle holds whether or not any specific guarantee of confidentiality was given at the time of interview (or self-response), or whether or not there are specific contractual obligations regarding confidentiality have been entered into, they may impose additional requirements which are to be adhered to strictly.

Procedures for maintaining Confidentiality

1. All ORC Macro employees and field workers shall sign this assurance of confidentiality. This assurance may be suspended by another assurance for a particular project.
2. Field workers shall keep completely confidential the names of respondents, all information or opinions collected in the course of interviews, and any information about respondents learned incidentally during fieldwork. Field workers shall exercise reasonable caution to prevent access by other to survey data in their possession.
3. Unless specifically instructed otherwise for a particular project, an employee or field worker, upon encountering a respondent or information pertaining to a respondent that s/he knows personally, shall immediately terminate the activity and contact her/his supervisor for instructions.
4. Survey data containing personal identifiers in ORC Macro offices shall be kept in a locked container or a locked room when not being used each working day in routine survey activities. Reasonable caution shall be exercised in limiting access to survey data to only those persons who are working on the specific project and who have instructed in the application confidentiality requirements for that project. Where survey data has been determined to be particularly sensitive by the Corporate Officer in charge of the project or the President of ORC Macro, such survey data shall be kept in locked containers or in a locked room except when actually being used and attended by a staff member who has signed this pledge.
5. Ordinarily, serial numbers shall be assigned to respondents prior to creating a machine-processible record and identifiers such as name, address, and social security number shall not, ordinarily, be a part of the machine record. When identifiers are part of the machine data record, ORC Macro's Manager of Data Processing shall be responsible for determining adequate confidentiality measures in consultation with the project director. When a separate file is set up containing identifiers or linkage information, which could be used to identify data records, this separate file, shall be kept locked up when not actually being used each day in routine survey activities.
6. When records with identifiers are to be transmitted to another party, such as for keypunching or key taping, the other party shall be informed of these procedures and shall sign an Assurance of Confidentiality form.
7. Each project director shall be responsible for ensuring that all personnel and contractors involved in handling survey data on a project are instructed in these procedures, have signed this pledge and comply with these procedures throughout the period of survey performance. When there are specific contractual obligations to the client regarding confidentiality, the

project director shall develop additional procedures to comply with the project in these additional procedures. At the end of the period of survey performance, the project director shall arrange for proper storage or disposal of survey data including any particular contractual requirements for storage or disposition. When required to turn over survey data to our clients, we must provide proper safeguards to ensure confidentiality up to the time of delivery.

8. Project directors shall ensure that survey practices adhere to the provisions of the US Privacy Act of 1974 with regards to surveys of individuals for the Federal Governments. Project directors must ensure that procedures are established in each survey to inform each respondent of the authority for the survey, the purpose and use of the survey, the voluntary nature of the (where applicable) and the effects of the respondents if any, of not responding.

PLEDGE

I hereby certify that I have carefully read and understand the aforementioned policies and procedures and will cooperate fully with them. I will keep completely confidential all information arising from surveys concerning individual respondents to which I gain access. I will not discuss, disclose, disseminate, or provide access to survey data and identifiers except as authorized by ORC Macro. In addition, I will comply with any additional procedures established by ORC Macro for a particular contract. I will devote my best efforts to ensure that there is compliance with the required procedures established by ORC Macro for a particular contract. I understand that violation of the privacy rights of individuals through such unauthorized discussion, disclosure, dissemination, or access may make me subject to criminal or civil penalties. I give my personal pledge that I shall abide by this assurance of confidentiality.

Print Name (Clearly Please)

_____/_____/2005
Signature Date

_____/_____/2005
Witness Signature Date

APPENDIX F

KAP Survey—Interviewer Training Manual

**Knowledge, Attitudes, and Practices (KAP) Survey
Interviewer Training Manual
2005**

ORC MACRO™
126 College Street
Burlington, Vermont 05401
(802) 863-9600

Introduction.....	4
Overview.....	4
The Role to the Health Care Community	5
Good Decision Making Depends on Good Data.....	5
How Are the KAP SURVEY Results Used?	5
The Importance of Conducting High Quality Interviews	6
Sample Fielding	6
Sample.....	6
Random Sample.....	6
Representing the Entire Population	7
Number of Attempts	7
Special Interviewers.....	7
Response Rates	7
The Role of ORC Macro.....	8
The Project Managers	8
Data Collections.....	8
Interviewers.....	8
Quality Assurance.....	9
The Data Processing Team	9
An Overview of the KAP Survey	9
Approaches to Interviewing.....	11
Use Your Best Voice and Phone Manner	11
Use a Conversational Style.....	12
Read Every Question Verbatim	12
Maintain a Professional Approach.....	13
Focus on Respondents and Listen Carefully.....	14
Make an Effort to Reassure Hesitant Respondents.....	14
Stay in Control of the Interview.....	14
Be Prepared to Deal with Problem Situations.....	15
Maintain Neutrality.....	16
Avoid Leading	17
Make Quality and Accuracy a Priority in all Aspects of Interviewing.....	17
A Look at the Questionnaire.....	17
Know How to Suspend and Resume.....	18
To Suspend:	18
To Resume:.....	19
KAP Survey Protocols	21
Reading Verbatim	21
Respondent Selection.....	22
Reselecting a Respondent	23
Unique Situations in the Household Selection Process	24
Proxy Interviews	25
Ensuring Respondent Confidentiality.....	25
Accuracy: Probing and Clarifying	25
Definitions of Race Dispositions	27

Dealing with Refusals	28
Refusal Basics	32
Glossary	33
Attachment 1	34
Spanish	34
Attachment 2	36
Comma Four Special Interviewers.....	35
Attachment 3	38
Client Contact Information	38
Attachment 4	39
Dispositions.....	38
Disposition Availability	39
Scheduling Callbacks.....	41
Leaving Messages.....	42
Message Abbreviations.....	43
NOTES.....	44

KAP Survey

Interviewer Training Manual

Introduction

KAP stands for Knowledge, Attitudes, and Practices.

The purpose of the KAP survey is to measure the public's knowledge, attitudes, and practices with regard to eye health and disease. The KAP survey was first conducted in 1991. Survey results from 1991 confirmed that the public is largely unaware of the benefits of early detection and timely treatment of eye disease. However, if they were encouraged, they would be likely to see appropriate eye care. The goals of the 2005 KAP survey are:

- Provide second point-in-time estimates and examine trends and patterns;
- Give new direction to messages and programs for target audiences; and
- Guide future Lions Clubs International Foundation and National Eye Health Education Program planning, research, and evaluation

Who are the people primarily responsible for obtaining the information in KAP surveys?

The answer is interviewers such as YOU. The importance of your role as an interviewer in the KAP survey cannot be overstated. The KAP survey requires excellent interviewing skills, attention to detail, and a professional manner and approach. This manual is designed to prepare you to conduct KAP survey surveys.

Overview

The Lions Clubs International Foundation, an organization recognized worldwide for its service to the blind and visually impaired, is sponsoring the KAP survey. The Lions Clubs will share the data with National Eye Institute (NEI), one of the Federal government's National Institutes of Health, an agency of the U.S. Department of Health and Human Services. The NEI conducts and supports research that leads to sight-saving treatments and plays a key role in reducing visual impairment and blindness. The NEI, through its National Eye Health Education Program (NEHEP), educates those at highest risk for eye disease and health professionals about sight-threatening eye diseases, and to prompt actions to prevent loss of vision.

The Role of the Health Care Community

Supporting people in their efforts to make lifestyle changes requires planning and cooperation. Public education, education for health care providers, prevention research, and changes in policy and the environment all play a part. This requires involvement of policy-makers at the Federal, state, and local levels of government. It involves the participation of other institutions and professionals in the fields of education, research, media, health care providers, insurance companies, and private businesses.

The data you collect on the KAP survey helps all these important players make informed decisions about eye health.

Good Decision Making Depends on Good Data

Measuring health risks through survey research is essential to the efforts of the NEI to promote eye health and prevent eye disease. This research provides the necessary data to identify and measure health risks and health issues, and to identify populations most at risk.

Until the KAP survey, there was no systematic tool to measure people's behaviors and practices regarding eye health and disease. The KAP survey represents an instrument to gather that data in a systematic way. KAP survey data provides a picture of the eye health practices of adults, and this data can be compared to historical data in order to understand point-in-time trends.

How Are the KAP SURVEY Results Used?

The KAP survey data are used to:

- Examine trends and patterns
- Improve public eye health strategies
- Educate the public
- Educate eye health care providers
- Support further clinical research

The KAP survey data that are collected and analyzed will be used to create reports, fact sheets, and press releases. These data are disseminated to educate the public, the professional health community, and policymakers about the public's knowledge, attitudes, and practices related to eye health and eye disease.

The Importance of Conducting High Quality Interviews

The most important factor in obtaining valid, reliable data is the KAP survey interviewer. After the interviews are completed, the only records are the answers that the interviewers have recorded. Answers that are not recorded cannot be analyzed, and those that are recorded incorrectly cannot be analyzed correctly. It is important to be consistent in conducting the survey, and to obtain answers that are as accurate and complete as possible on every interview. Interviewing technique affects data quality, and data quality influences important decisions.

Sample Fielding

The methodology behind fielding the KAP survey is structured to ensure reliability and to prevent bias in the data. Ideally in order to collect data that reflects the knowledge, attitudes, and practices of adults, data would be collected from all adults. But, of course, this is impossible. A statistical survey such as the KAP survey gathers information from a pre-determined number of people. Researchers then formulate conclusions based on sophisticated mathematical calculations. The KAP survey protocols are designed to ensure that the data that is produced is *representative, consistent, and complete*.

Sample

The KAP survey is a point-in-time survey that will only be in the field for about six weeks. We will collect a national probability sample of 2,400 non-institutionalized adults age 18 and over. Sample will be drawn from all 50 states. We will also conduct an oversample of 200 Asians. The sample for the Asian oversample study is drawn based on high-density Asian exchanges.

Random Sample

To prevent bias and ensure that the sample is random, all telephone numbers in the KAP survey are selected at random. The computer is provided with the area code and a three-digit prefix in order to select the region for calling. The computer then randomly selects the last four digits of the telephone number. Therefore, all possible numbers within a region have an equal probability of being selected for calling. Selection is not based on whether or not a phone number is listed or assigned. Any number within the area code may be called.

Representing the Entire Population

Within each eligible household, the interviewer (with the help of the computer) conducts a random selection of adults in the household. This is done to ensure that the people we select are as representative as possible of the entire population. The goal of this selection process is to ensure that the demographics of the people who are surveyed match the demographics of the population.

Number of Attempts

Each record in the sample must receive a terminal disposition, or 15 attempts, before no more calls are made to the number. There will be three designated calling occasions: weekday (9–5), weekday evening (5–9), and weekend. These calling protocols minimize bias (such as only calling people available in the evening) and maximize response rates (this effort designed to reach every eligible respondent). There should be a minimum of 5 rings per attempt at a record; and all records will be called once per shift.

Special Interviewers

There will be two types of special interviewers designated for the KAP survey. “Comma Four” interviewers call records that have previously received a specified number of refusals or that have received a disposition that must be verified. (These include “unable to complete due to impairment,” “no eligible respondent during time period,” and “language barrier”.) In surveys where interviews are collected in a language other than English, in-language interviewers call records that have been given a disposition indicating that a language other than English is the household’s primary language. In addition to English-language interviewing, we also collect interviews in Spanish (“comma 5”).

Response Rates

The response rate measures the extent to which interviews were completed from among the telephone numbers selected for the sample. The higher the response rate, the lower the potential for bias in the data.

In recent years, response rates have been declining. This may be due, in part, to new technologies such as privacy managers and caller ID. Because of these obstacles, we all need to work harder to maximize response rates.

Interviewers are the primary people responsible for achieving high response rates. The way to achieve this objective is to:

- Use your best calling skills on every interview.
- Become successful in dealing with resistance and refusals.
- Know and use the strict protocols for dispositions.
- Make callbacks to reach respondents.

We will be discussing these in detail later.

The Role of ORC Macro

The Project Managers

The project management team and programmers work together to prepare the study for fielding, based on conditions, protocols, and goals of the project. ORC Macro's contract specifies that certain protocols will be followed; this is done to ensure reliable data. Project managers train data collections staff on survey protocols, and monitor data collection reports as the study progresses. This information is then passed on to the client in status reports. Some of the things project managers report to clients includes response rates, number of attempts, and records per complete. These measure the efficiency and productivity of the calling effort, and compliance with predetermined calling protocols. After completion of fielding, project managers present a final, clean "dataset" to the client.

Data Collections

At the beginning of fielding, project managers and data collections staff conduct interviewer trainings on KAP survey protocols. Data collections staff also run reports to track production rates, refusal rates and sample efficiency. These reports help data collections staff to make decisions about staffing levels and need for interviewer training on specific topics, such as how to avert refusals.

Interviewers

This is where you come in. Conducting the interview is the most important part of collecting KAP survey data. When you conduct each interview professionally, without bias, and record the responses accurately, you ensure that the data ORC Macro produces for its client is valid and of the highest quality.

Quality Assurance

Data collections staff and project managers review the work of the call-room overall, and the work of individual interviewers, in regard to accuracy of dispositions, quality of CfMC (Computers for Marketing Corporation—the software package we use in our Computer-Assisted Telephone Interviewing) messages, frequency of “don’t know” responses, rates of refusal, and other calling practices.

The Data Processing Team

The data processing team reviews the data collected in interviews before sending the data to the client. This review “cleans and edits” the data. An example of “cleaning” is an examination of responses recorded under “specify” or “other” to see if these responses could have been coded as one of the response options that was provided. For example, anyone who responds to an ethnicity question as being “European,” will be recoded as “White.” If not, the response is checked for spelling and sent to the client verbatim. The data processing team also looks for conflicting information or for items that “don’t add up.” They review dispositions for accuracy, and to see if frequency of dispositions fall within expected ranges. If and when we find “suspicious” responses in the data, we must contact respondents again for verification.

All of these steps are taken to ensure that the work performed at ORC Macro is of the highest quality.

An Overview of the KAP Survey

The KAP survey has seven sections of questions that are used to make up a complete survey. Each section is designed to capture specific information that collectively measures the public’s knowledge, attitudes, and practices related to eye health and eye disease.

General Health: A look at overall respondent health.

Eye Health: A focused look at vision correction and specific vision related conditions.

Eye Examinations: Experiences and attitudes regarding respondent eye exam visits.

Knowledge About Eye Disease: Measures respondent knowledge regarding specific eye conditions.

Information Sources: Identifies where and how respondents obtain information about eye health and disease.

Insurance: Measures respondent access to healthcare.

Demographics: Respondent education, marital status, age, race, and income.

The KAP survey consists of these parts:

The Introduction

- > go to the selection process -or-
- > go to a disposition choice or screen

The Selection Process

- > go to the survey questions -or-
- > go to a disposition choice or screen

The Survey Questions

The Close and Thank-You

Other aspects of the KAP survey that are important to know: (suggestion: use this list as a worksheet when you go on practice. Keep it as a reference for making notes when you have questions).

- Each survey takes between 15 and 20 minutes.
- The limited nature of the sample dictates approaches to interviewing, refusal conversions, handling dispositions, and scheduling callbacks.
- Interviewers are responsible for knowing and following all KAP survey rules and protocols. These include: Reading Verbatim; Respondent Selection; Reselecting a Respondent; Ensuring Respondent Confidentiality; Accuracy: Probing and Clarifying; Dispositions; Scheduling Callbacks; Leaving Messages; and Refusal Conversion.
- Read **100% verbatim** on all questions. The one exception is on the introduction in a refusal situation.
- The respondent selection process requires care and attention.
- There are many different *types* of questions in the KAP survey. These types include: scales, tests of knowledge, questions with multiple responses, questions of opinion, and factual questions.
- The screens containing KAP survey questions also include instructions to interviewers: [READ LIST], [MULTIPLE RESPONSES ALLOWED], etc.
- The KAP survey contains *skip patterns* in which the answer to one question influences the structure or choices of the following questions.
- The KAP survey contains vocabulary that may be new and must be learned. Don't hesitate to ask for help with pronunciations.

It is possible to suspend and resume on the KAP survey. When a suspended survey is resumed, the screen contains specific information for interviewers. The record cannot be suspended again until at least one question has been answered.

Approaches to Interviewing

There are four elements to an interview: the survey questionnaire; the protocols; the respondent; and the interviewer. The questionnaire and the protocols are fixed and unchanging. Respondents are the biggest variable; they represent the whole range of human behavior and experience. Every respondent presents a different degree, or kind, of challenge. Interviewers can learn to *follow protocols and at the same time successfully handle any challenge* a respondent might present.

Use Your Best Voice and Phone Manner

The first 15 seconds of the survey's introduction can make the difference between success and resistance. Your attitude comes through in your voice. So, remember to:

- “Smile while you dial.”
- Be focused.
- Sit up straight in your chair.
- Talk directly into the mouthpiece.
- Be courteous and friendly, pleasant, and professional.
- Maintain an even tone of voice.
- Speak as clearly as possible.
- Read the script with good expression, and in a natural, conversational manner.
- And...

Listen carefully to the person with whom you are speaking and adjust your volume, pace, and expression accordingly.

Give the introduction enough time. Don't rush. You may have said this introduction hundreds of times, but the person with whom you are speaking has never heard it before. If a respondent has to strain to understand what you are saying and why you are calling, what are the chances this person will cooperate? Just “reading the words” is not enough. You must think about communicating with the person who is on the phone.

Approach introductions with confidence, and be patient and polite at all times.

Use a Conversational Style

Interviews move along smoothly when respondents *understand the question the first time you read it*. The key to helping the respondent understand the question is to read verbatim in a conversational, natural manner.

- Be sure that you understand the question.
- Look for the main idea of the question.
- Pick out a word or phrase that you can emphasize to convey the question's meaning.
- Read every question with clarity and expression.
- Practice your delivery until it is smooth and conversational.

Read Every Question Verbatim

Read every question exactly as written on your screen. Read every question in full. Do not paraphrase a question based on a previous answer the respondent has given you. Interviewers must read verbatim to *ensure that every survey with every respondent is conducted in the same way*. Data collected in a survey is reliable and valid only if *every question is read verbatim*.

Reading verbatim is the absolute foundation of conducting an interview. Reading verbatim is the *only way to obtain reliable information*. In addition, interviews move along *more smoothly* when interviewers read verbatim. Here is what can happen when interviewers stray from verbatim:

- The interviewer's voice loses authority and confidence and begins to sound hesitant.
- Respondents get anxious. ("Who are you? Where did you say you were calling from?")
- The interview *takes longer*, because you have to go back and correct for the inaccuracies or misunderstandings that arose from changing the script.
- The interviewer loses control of the interview.
- The data entered is invalid or skewed.

"I was afraid the guy was going to hang up on me" is *not a valid excuse* for not reading verbatim. There is no valid excuse for not reading verbatim.

Read verbatim. Do not change or abbreviate the wording of any question. No matter what is going on with a respondent in a particular interview, as long as you are conducting the interview, you must read every question verbatim.

Please see ‘Reading Verbatim’ in the ‘KAP Survey Protocols’ section of this manual for more information on rules and protocols regarding verbatim.

Maintain a Professional Approach

The KAP survey interviewer has a *job* to do. This job makes the matter of speaking on the phone different from a phone conversation with a friend.

In a conversation with a friend, it is “natural” to provide “normal human responses.” But doing this in an interview leads to practices that are unprofessional and unacceptable: commenting on positive information (“That’s good!”), commiserating with a respondent (“That’s so sad!”), sharing your own experience, knowledge, or opinion (“My uncle has that disease.”), apologizing for questions (“This is gross, but I have to ask...”), or helping the respondent to decide on an answer. These comments, while they may seem natural and compassionate, have no place in professional interviewing.

You are not a friend or therapist for the respondent. You do not have to “fix things” for the respondent. To the extent that you take on these roles, you are engaging in “off-task” behavior. You may have strong feelings about what a respondent tells you. You may strongly agree or disagree with what the person is saying. But you need to *keep these feelings and opinions to yourself*. It’s not professional to bias the interview with your own feelings and opinions. And doing so makes the data unscientific and invalid. *Your job* is to obtain reliable, valid, complete, and unbiased information.

Instead, you can build rapport with a respondent by maintaining a pleasant voice quality, reading the questions in a natural, conversational manner, reading with expression, verifying or repeating back an answer, and sounding interested. These qualities are often enough to reassure a respondent and build his or her confidence in the interviewer.

Remind yourself that as an interviewer on the KAP survey, you have a *very important job to do*. Being professional means being prepared, reading verbatim, understanding the survey, building your skills as an interviewer, and giving every call your best effort.

Observation: Some excellent interviewers, who also have very high completion rates, conduct other similar interviews *without an extra syllable* of commentary, not even “Okay.” They are thoroughly neutral and professional. Respondents do not often hang up on them. Why? These interviewers have excellent clarity, pace, expression, and voice quality. They read every question as if they are *thinking about the question*.

They sound as if their whole attention is *focused on the respondent*. They are proof that this approach works!

Focus on Respondents and Listen Carefully

Pay close attention to what respondents are saying and how they are saying it. If the respondent seems rushed, pick up the pace a little. Listen for hesitation or pauses that might indicate uncertainty and a time for you to probe or verify. An interviewer's *tone of voice, attentiveness, and receptive manner* can make the difference between a hang-up and a completed interview.

Make an Effort to Reassure Hesitant Respondents

Interviewers are expected to handle any respondent objections, questions, or complaints smoothly and professionally. Remain polite, respectful, professional, and informative. This is the best way to reassure a respondent who is hesitant and obtain cooperation from a respondent who expresses objections. Answer a respondent's questions in a *courteous, confident manner*.

If you have a problem answering any particular question, make a note of it. Look up the answer or ask for help. Be ready with an answer the next time.

Stay in Control of the Interview

The interviewer must establish, and maintain, control of the interview. Here are some situations that can lead to a loss of control:

- The respondent is rushed and “just wants to get this over with.”
- The respondent is overly chatty and gives a narrative.
- The respondent is confused or unable to focus.
- The respondent is argumentative.
- The respondent is emotional or giving answers that may be sad, depressing, or alarming.

When presented with these situations, interviewers are sometimes tempted to abbreviate the script, rush the interview, or engage in off-task conversation, or other practices that compromise the validity of the data collected. An interviewer who does these things has *lost control of the interview!* Your task is to read every question verbatim and obtain valid and accurate answers. Be prepared with strategies to maintain control. Some strategies for this are described in the next section.

Be Prepared to Deal with Problem Situations

Experienced interviewers build up a repertoire of phrases to use in difficult situations that arise during an interview. Here are some suggestions for dealing with difficult situations. Other approaches may also work. Keep track of these in your notes.

The rushed respondent: “We have only about five minutes (give an honest estimate) left until the end. We can do this quickly if we both focus on the questions.” Or, “It is possible to suspend this interview and complete it at another time. We can arrange a time at your convenience. Would you prefer to do that?”

The chatty respondent: “You are making some good points. We’ll be getting to some of those questions in a little while. If there is anything we haven’t covered by the end of the survey, you can tell me then.” Then re-read the question and the choices provided.

The confused respondent: When the respondent is not able to decide on an answer or does not seem to understand the question, the entire question should be repeated. Repeat the question more slowly, making sure you are speaking directly into the mouthpiece. Repeat the answer choices if necessary. The respondent may not have heard the question fully the first time, or might have missed the question’s emphasis.

The distracted respondent: Re-read the question and the choices. Try to move the survey along, bringing the respondent back to the next question. Offer to suspend if the respondent is distracted by something else going on in the house. (Offering to suspend sometimes helps a person to focus better!) Listen carefully and try to analyze what’s going on. In these situations, you need to use good judgment and deal with the situation accordingly.

The argumentative respondent: Once you get into the survey questions, it is rare to have a respondent become argumentative on this study. You can say, “These are the questions the Lions Clubs International Foundation consider to be important.” “You can refuse to answer any question you don’t want to answer. Remember, all your answers are confidential.”

The abrupt respondent: If a respondent has answered a question previously and cuts you off, say, “I have to read every question as it comes up on my screen.”

The forward respondent: One way to deal with a respondent who answers the question before you have read the whole question is to go ahead and read the whole question every time or say, “I have to read every question in full.” Respondents then get the idea that they will have to listen to the whole question before giving an answer.

The emotional respondent: Above all, maintain focus, and listen. Adjust your pace and tone of voice, if necessary. In general, as long as the respondent is able to focus, and can understand and answer the questions, continue the interview. Only if necessary: If the respondent is unable to continue, you can offer to suspend the interview until a later time.

All of these strategies help interviewers stay in control of the interview. Done smoothly and confidently, with a pleasant voice and manner, these techniques can also help you *to build rapport with the respondent*.

Note: After a difficult interview, take a deep breath and count to five to clear your mind before beginning the next interview. Promise yourself to take extra good care of yourself on the next break.

Maintain Neutrality

The interviewer must make every effort not to influence the respondent’s opinions, suggest answers, or lead the respondent to a specific answer. Interviewers should be *nonjudgmental, noncommittal, and objective*. Nothing in the interviewer’s words or manner should imply criticism, surprise, approval, or disapproval of either the questions or a respondent’s answers. A respondent may be very sensitive to even your slightest reaction or comment. Read the script in an even, neutral tone, and *avoid reacting in any way* to a respondent’s answers.

It is acceptable to verify an answer that a respondent has given you. This affirms that you have heard the response and are recording it accurately. Simply repeat the response, and move on. This demonstrates that you are interested in the respondent, and can help to build rapport. This verification maintains neutrality in that it does not judge or comment on the answer. Verifying the answer is also one way to break the habit of saying “Okay” after a response.

In conducting an interview, you are giving the respondent something valuable. You are giving the respondent *your full, unbiased attention*. You are *focused on the respondent and listening carefully*. You are giving the respondent an opportunity *to be represented* in an important study.

A neutral approach *helps the respondent to feel comfortable* answering the questions truthfully and completely. The questionnaire is designed to elicit a free flow of ideas and opinions. Respondents *need the freedom* to say what they think and feel *without being influenced* by anything an interviewer might say.

Avoid Leading

Before you receive the survey to administer to respondents, its questions are written carefully, revised, and then tested. In most instances, it should be sufficient to read the question and obtain an answer on the first try.

If the respondent is having trouble answering the question within the choices given, re-read the question and the answers. It is your job to get the *respondent to commit to an answer*. Use neutral probes, if necessary. You want the answer to *come from the respondent*, and not from anything you have suggested or influenced.

Interviewers who lead respondents often do so because they fear a break-off, they feel the respondent is rushing them, or they lack confidence in their ability to probe skillfully.

Make Quality and Accuracy a Priority in all Aspects of Interviewing

While you are conducting an interview, keep in mind the objectives of the KAP survey. Remember that this is an important study that has the potential to affect the health of all adults. Remember that the client is relying on you and is counting on your best effort on this and every interview. Be prepared; know the survey; use your best voice quality; read verbatim; probe when necessary; record all answers accurately. *Strive to meet productivity standards without sacrificing quality.*

A Look at the Questionnaire

As you go through practice, try to anticipate the kinds of challenges posed by different questions. Refer to the KAP survey questionnaire for clarification about the intent of any question in the survey. A copy of the complete questionnaire is available from supervisors.

- Understand the nature and content of the questions.
- Understand the intent of the question.
- Note the type of question.
- Be ready for specific probes on certain questions.
- Become aware of skip patterns.
- Be prepared to answer any questions that come up in the course of the survey.

Know the length of the survey and be able to estimate the number of minutes left to complete.

Note: Control of the interview begins with the first questions. In the first sets of questions, the interviewer and the respondent are in a process of “getting to know each other.” As an interviewer, you are establishing control of the interview and that you will be reading verbatim, with probing as needed. By your tone and manner, you are conveying that you are focused on the business at hand and that you are listening attentively.

Know How to Suspend and Resume

Suspending an interview saves all of the information collected up to that point in the survey. The interview can be resumed at the next question without having to go back to the beginning.

To Suspend:

Type “suspend” at the arrow prompt: → suspend.

A screen will appear warning that you are entering the suspend block. Enter a 1 to continue:

```
INTERVIEWER, YOU HAVE ENTERED THE SUSPEND BLOCK.  
  
      THIS WILL CREATE A MIDTERMINATE WITH PARTIAL DATA  
  
      THAT WILL BE ABLE TO BE RETRIEVED AT A LATER DATE.  
  
      PRESS "1" TO SCHEDULE CALL BACK INFORMATION  
  
-->1
```

Next you will come to the disposition screen. You will have two dispositions to choose from. 166 is a midterminate refusal. This should be used when the respondent does not wish to finish the interview. 167 is a midterminate callback. This should be used when the respondent is willing to finish at a later time.

```
Interviewer: Select status from the following list...  
  
      Interview was suspended because...  
  
      166 Midterminate-refusal (selected person FINISHED part of the  
          interview, refuses to finish)  
      167 Midterminate-call back (selected person FINISHED part of the  
          interview, will finish at some other time)
```

After entering the appropriate disposition, the next screen will prompt you to leave a message.

```
Study name: DEV4, comment: 'KAP SURVEY 2005', datacolumns 4000
Type comment to be saved with suspended interview (1 line)
```

Leave a very specific message stating why the interview was suspended, whether or when the respondent requested a callback, etc. For example,

```
11/14 SSPND sf's baby woke up; req C/B 11/15 6:00PM 999b
06/05 SSPND sm refused on insurance question & HU! 999b
03/20 SSPND ¾ done, in exam q's; C/B 3/23 10:00AM 999b
```

On the next screen, an instruction will appear to enter a time to call back. You must **always** enter a callback time, even if you only enter a date. If the respondent did not request a specific callback time, you should enter a callback time for at least 2 days ahead.

```
When to call back (999-999-9999)?-->
```

After you enter the callback time, a confirmation will appear for you to accept the callback time or go back and change it.

```
When to call back (999-999-9999)?-->7/30/04 1700
Call back at: FRI JUL 30 2004 05:00pm      (TIME HERE)
              FRI JUL 30 2004 05:00pm      (TIME THERE)
This OK? (Y or N)-->
```

To Resume:

The call history screen gives the first indication that a record has previously been suspended. A new line appears saying, "Message typed when interview suspended:" A message from the interviewer who suspended the record appears below that line. While you are still on the intro screen, and before you resume the interview, *be sure that you are speaking with the selected respondent!*

Become familiar with the introduction screens – they contain many clues about previous call attempts and can give you an advantage in your attempt to complete the interview. For example, the screen below tells us that the call was suspended (MAIN LAST STATUS=179), that the SELECTED PERSON is the oldest female, that the call was

suspended because the baby woke up, and the interview has not yet reached the gender question in the demographic section of the interview.

Also note that the quick dispositions on this introduction screen are different – to continue the interview, you must enter a 05 instead of 01. This is one more safeguard built in to remind you to be sure you have the correct respondent on the phone before you continue the interview.

After the introduction screen, the next screen to come up could be the first survey question, or you might have to go through two more screens before arriving at the question that resumes the survey. Ask for patience while getting to the survey questions. When ready, say “We can go ahead and continue the survey now,” and then ask the first question.

```
Next Interview: (999) 999 - 9999 Master ID: ctB007760
      Messages:
          State: ct   MADE IT TO GENDER Q (1=M,2=F OR BLANK) :
          SELECTED PERSON: Oldest Female
REASON FOR TERM. AFTER SELECTION: 11/14 baby woke up C/B 11/15 6:00PM
999b
Main Last Status: 179
=====
HELLO, I'm calling for the Lions Clubs International Foundation. My
name is _____. We are gathering information about eye health and eye
disease. The survey is conducted by the Lions Clubs Foundation. Your
telephone number has been chosen randomly, and I would like to
ask you some questions about you knowledge, attitudes, and practices
related to eye health and eye disease.
Is this (999) 999 - 9999?

02 No answer
03 Normal busy
04 Answering machine
05 Oldest Female on the phone (Proceed to next question)
07 Termination screen
08 Hang up - Before INTRO
12 Respondent refused to transfer to selected-1x
13 Respondent refused to transfer to selected-2x
14 CONTINUE IN SPANISH
-->
```

CAUTION! If something happens and you must suspend again, you must ask at least one question or enter “refused” to one question before suspending again. If you just suspend without doing this, the record will result in a “blow case,” and all the information will be lost. This record will have to be started all over again, right from the selection process. The interviewer who has to deal with this situation will have to be very persuasive, apologetic, and patient.

KAP Survey Protocols

The following procedures must be followed to ensure that all of the data collected is reliable and consistent. ORC Macro's contract with the client specifies that these protocols will be followed. It is your responsibility as an interviewer to understand and implement these protocols.

Reading Verbatim

Much work has gone into the writing and testing of the KAP survey questions. Every question should be read to the respondent exactly as written. Studies have shown that even slight wording changes, such as substituting “should” for “could,” drastically influence the respondents' perception of what is being asked—and therefore their responses to the question.

- The questionnaire should be thought of as a script, and the questions should be *read exactly as they appear*.
- Questions must be read in the *exact order* in which they appear.
- Read all questions *in full*. Never accept an answer if you are interrupted and have not read the entire question.
- Interviewers must ask *every question*. In answering one question, a respondent may sometimes answer another question that appears later. If that happens, the interviewer must *still ask the question*.
- Some response lists must be read to the respondent. These will be indicated by the instruction to **[Read List]** or **[Please Read]**. Never accept a response until you have read the full list.

The questions that appear on the screen are part of the contract agreement between ORC Macro and the client. These are the questions the *client wants interviewers to read*. ORC Macro, in signing the contract, is guaranteeing that interviewers are *reading verbatim*. Quality assurance assistants and supervisors monitor interviewers to verify that interviewers read verbatim.

Respondent Selection

Proper administration of the selection process is extremely important. None of the survey questions can be asked until an eligible respondent has been selected. Give this process enough time and attention. The selection process ensures that we are interviewing all types of people. If this is done incorrectly, the data is invalid. This process has a number of steps.

Eligible phone number: Verify the phone number on the introduction screen. Only residential phone numbers are eligible. Non-eligible numbers include businesses, cell phones, computer and fax lines, pay phones, etc. Non-residential phone numbers should be assigned an appropriate disposition.

Eligible Household: An eligible household is a housing unit that has a separate entrance; where occupants eat separately from other persons on the property; and is occupied by its members as their principal or secondary place of residence. Non-eligible households include the following:

- Vacation homes occupied by household members for *less than 30 days per year*.
- Group homes (sororities and fraternities, halfway houses, shelters, etc.).
- Institutions (nursing homes, college dormitories, etc.).

Selection Process: Interviewers will ask how many adults over age 18 are residents of the household. Then, they will ask how many of these individuals are male, and how many are female. (In a single adult household, the interviewer will ask, “Are you that person?” and if the adult is a man or a woman, if necessary.) Once the information is entered, the computer randomly selects one person to be interviewed.

Eligible Residents: Eligible household members include all related adults (aged 18 years or older), unrelated adults, roomers, and domestic workers who consider the household their home. Household members do not include adult family members who are living elsewhere.

As you go through the selection process, remember the following:

- Everyone 18 or older should be counted among the adults living in the household. High school students who are 18 years old or older should be included, as should adult children living at home. College students who are living away from home should not be included.
- When you are asked to confirm the number of men and women in the household, be sure to read this back to the respondent and get confirmation that this is correct.

Verifying the selected respondent: In order to proceed with the survey, the *selected respondent, and no other person*, must be on the phone. If at any time you begin to question whether you have the correct respondent on the phone, verify with whom you are speaking. You may have to ask the correct person to come to the phone, and then back up and repeat questions with that person. You may have to end the call and put in a callback to reach the correct person at another time. Both of these are better options than completing the interview with the wrong person.

Reselecting a Respondent

Occasionally, something goes wrong in the selection process: the residence is confirmed as eligible, but there is no person fitting the description of the selected respondent; the selected respondent has moved out (or is now deceased); etc.

Once a respondent has been selected, **the interviewer cannot re-select a respondent**. If you feel that the selection process was invalid for any reason, stay on the screen and contact a supervisor. Explain the reason you are concerned. The supervisor will confirm that the selected respondent is correct or will enter a code to change the selected respondent. Refusal is ***not a reason*** to reselect the respondent!

If you are within the survey and feel that the selection process may have been flawed, write down the master ID and contact your supervisor. If the supervisor agrees that you need to reselect, you will need to back up through the survey until you come to the selected respondent introduction and confidentiality statement. At this point, you would enter the disposition 002 (go back to adults question) and the supervisor would enter the password. Then you can redo the selection process (if the respondent is still on the phone). If the respondent is not on the phone, schedule a callback and make a note in the message field that reselection is needed. This will make the process easier and quicker for the next interviewer that calls this record.

The interviewer should follow these steps:

- Verify that the selected respondent does not live there.
- Explain the situation to the resident with whom you are speaking.
- Contact a supervisor to enter a code to re-select a respondent.
- After the code is entered, the question "Is this a private residence?" comes up on the screen.
- Go through the selection process with the respondent, and complete the interview or schedule a callback.
- The re-selection process can be done while a respondent is still on the phone.

If the respondent is no longer on the phone, schedule a callback, using a 104 or 105 disposition.

Unique Situations in the Household Selection Process

Interviewers must make a determination as to whether the telephone number reaches a household, and determine the correct disposition.

What are the criteria for a private residence?

- The person answering the phone does NOT say that the number is a business, institution, group home, pager, fax machine, cell phone, or modem.

What is the proper disposition for dedicated faxes and modems?

- Code faxes and modems identified as such on the first call attempt as “018-Fax machine”

What if the number is both a phone and a fax?

- If the first call placed is something other than a fax and the next call is a fax, the number may not be a dedicated fax line. Code any fax as “018 Fax machine” and continue to call. The system will put the record back into calling a specified number of times to cover the possibility that the number is used for both phone and fax. If a specified number of consecutive additional calls are faxes and there is no evidence the number rings into a residence, the number may be assigned a final disposition of “018 Fax machine.”

What is EFAX and how should it be coded?

- EFAX is a service that permits voice messages and faxes to be sent to an e-mail account. When a number is called, a message identifies this number as an “EFAX subscriber.” These numbers will never ring into a residence and should receive a final code of “Not a private residence.”

If a respondent states they reside at this number for less than 30 days a year, should the interview continue?

- The interview should be terminated and coded as “Not a private residence.” If the respondents state they live at the residence 30 days or more, then continue the interview.

How are timeshares handled?

- If the respondent indicates the residence reached is a timeshare, and they do not live there for 30 or more days a year, code as “Not a private residence.”

Proxy Interviews

A proxy interview is one in which one person answers for another. Proxy interviews can *never* be conducted on the KAP survey. There are several reasons for this:

- The proxy may not have the correct information.
- Many questions are very personal, and the respondent may not be willing to give honest answers to the proxy.

If the person on the phone says that the selected respondent cannot hear well enough to do the interview or is too ill to come to the phone, make an attempt to speak to the selected respondent to determine for yourself whether or not the interview can be conducted with that person. If it is not possible, the record should be given an appropriate disposition such as “unable to complete due to impairment”.

Ensuring Respondent Confidentiality

The KAP survey contains sensitive questions and information. It is natural and understandable that respondents will question where the data is going and how it will be used. When a respondent asks questions about confidentiality, be prepared with an explanation. Take enough time; don't rush the explanation. Mention these points:

- No information that can identify you is ever used in a KAP survey report.
- The data is only reported in aggregate, or group, form.
- Any identifying information, such as a telephone number, is separated from your responses once the data has been collected and compiled. The computer separates the identifying information from the final report.

As an interviewer, you have signed a confidentiality agreement as a condition of employment, and are not allowed to discuss this study or any study with anyone outside the call-room and outside of work-related conversations.

Accuracy: Probing and Clarifying

Probing and clarifying, or using words to obtain more information or more precise information, is one of the most challenging and important aspects of interviewing. Probes are used when an answer is inadequate and requires the interviewer to seek more information. Probes are also used when a respondent is unsure of an answer and is having trouble making a choice.

***Keep these general ideas about probing and clarifying in mind:**

- Effective probing requires that the interviewer understand a question’s rationale. Different questions ask for different kinds of information. Learn the intent of the question. Different kinds of questions require different kinds of probes or clarifying techniques.
- Use neutral questions or statements to clarify a response or elaborate on an inadequate response:
 - *Can you explain that?*
 - *I can only enter one answer. Which would you like me to record?*
 - *What does the question mean to you?*
 - *Which choice would you like me to use?*
 - *Would you like me to enter “yes” or “no” for that?*
 - *So, on a scale of “excellent, very good, good, fair, or poor, what would you like me to put?*
- Some questions allow for multiple responses. Ask “*Anything else*” until the respondent says, “no,” or until you have entered the number of answers allowed.
- When the respondent is unable to decide on an answer, does not understand the question, or misinterprets the question, the entire question and the choices should be repeated.
- The silent probe is also useful. Pausing or hesitating indicates that more, or better, information is needed.
- Respondents often dodge a question with “I don’t know.” An initial “I don’t know” should be probed. Sometimes the respondent just needs a little time to think over the answer. If the respondent really does not know the answer, record “Don’t know.” (Occasionally, “Don’t know” is a legitimate choice, as in a question of knowledge—as opposed to experience). In this instance, no probe is needed.)

It is especially important to probe on questions that are part of a skip pattern. Future questions depend on the answer to these questions. Make a note of where skip patterns occur in the survey.

- You can verify that you have recorded the correct answer by repeating the answer back to the respondent. This also helps to prevent the use of “affirmation” phrases, such as “okay”, “good”, and so on, which can be leading or influence a respondent’s responses to questions.

Definitions of Race Dispositions

Correct coding of race is very important in the KAP survey. The data collected in this question is used in classifying and weighting the data. Collecting inaccurate data in this question can cause significant bias and invalid results.

The following definitions of race, which were established by the Census Bureau, are followed by the KAP survey.

“Hispanic origin or descent” People who identify with the terms "Hispanic" or "Latino" are those who classify themselves in one of the specific Hispanic or Latino categories listed on the Census 2000 or ACS questionnaire—"Mexican," "Puerto Rican," or "Cuban"—as well as those who indicate that they are "other Spanish, Hispanic, or Latino." Origin can be considered as the heritage, nationality group, lineage, or country of birth of the person or the person's parents or ancestors before their arrival in the United States. *People who identify their origin as Spanish, Hispanic, or Latino may be of any race.*

“American Indian and Alaska Native” refers to people having origins in any of the original peoples of North and South America (including Central America), and who maintain tribal affiliation or community attachment. It includes people who indicated their race or races by marking this category or writing in their principal or enrolled tribe, such as Rosebud Sioux, Chippewa, or Navajo.

“Asian” refers to people having origins in any of the original peoples of the Far East, Southeast Asia, or the Indian subcontinent. It includes people who indicated their race or races as “Asian Indian,” “Chinese,” “Filipino,” “Korean,” “Japanese,” “Vietnamese,” or “Other Asian,” or wrote in entries such as Burmese, Hmong, Pakistani, or Thai.

“Native Hawaiian and Other Pacific Islander” refers to people having origins in any of the original peoples of Hawaii, Guam, Samoa, or other Pacific Islands. It includes people who indicated their race or races as “Native Hawaiian,” “Guamanian or Chamorro,” “Samoan,” or “Other Pacific Islander,” or wrote in entries such as Tahitian, Mariana Islander, or Chuukese.

“Black or African American” refers to people having origins in any of the Black racial groups of Africa. It includes people who indicated their race or races as “Black, African Am., or Negro,” or wrote in entries such as African American, Afro American, Nigerian, or Haitian.

“Caucasian” refers to people having origins in any of the original peoples of Europe, the Middle East, or North Africa. It includes people who indicated their race or races as “White” or wrote in entries such as Irish, German, Italian, Lebanese, Near Easterner, Arab, or Polish.

“**Other**” was included in Census 2000 for respondents who were unable to identify with the five Office of Management and Budget race categories. Respondents who provided write-in entries such as Moroccan, South African, Belizean, or a Hispanic origin (for example, Mexican, Puerto Rican, or Cuban) are included in the “Some other race” category.

Dealing with Refusals

KAP survey protocol specifies that, with the exception of verbally abusive respondents, eligible persons who initially refuse to be interviewed will be contacted at least one additional time to give them the opportunity to complete the interview. It is best for this second contact to be made by a supervisor or a different interviewer. Here are a few things to keep in mind about refusals and your approach to them:

- Respondents are sometimes rude and hostile for reasons that have nothing to do with your skill as an interviewer or you as a person. Don’t take these reactions personally.
- Rather than reacting to a respondent’s anger or resistance, *remain calm* and *listen*. Use what you are hearing to address the respondent’s objection.
- Refusal conversion skills get better with practice. *Make the effort* at refusal conversion every time you encounter resistance.
- Listen to other interviewers who are successful at refusal conversion. Notice what they do. For one thing, often their voices become even more pleasant, conversational, and gentle. For another, they don’t say the same line every time. They adapt their approach to the particular respondent.
- Do not be afraid to be assertive with hesitant respondents; use all of your powers of persuasion to get the interview. *Now is better than later*. Research has shown that the highest completion rates occur at the initial contact and decline with each successive call. Unless it is clearly a bad time, the interviewer should always try to convince the respondent to do the interview.
- Project a confident and reassuring manner while conveying a genuine interest in the respondent. For example, if the respondent is in the middle of cooking dinner, apologize for calling at an inconvenient time, and offer to call back later. This will convey the interviewer’s willingness to accommodate the respondent and acknowledge the importance of the respondent’s time.
- It is very important to document the reason for the initial refusal because this information may help convert a refused interview into a completed interview on a later call.

- Use the information in the message field (from the initial refusal) to prepare specific responses and approaches on the present call.
- Distinguish between a refusal and an appointment. “I don’t have time to talk right now,” may indeed mean that the person is busy. In this case, try to set an appointment for a callback time.

If a respondent seems willing to participate, but is concerned about the survey’s legitimacy, explain the purpose of the survey. Offer the supervisor 1-800 number at your call station.

Supervisor-Handling a contact when you need to interview a selected respondent

In the event that a respondent asks to speak with a supervisor or calls the 800-number directly, “We are conducting a nation-wide study on behalf of the Lions Clubs International Foundation in which we need an equal number of men and women to participate. You/Your wife/husband has been chosen. According to the survey protocol we must attempt to reach you/her/him. If you would like a number to contact the Lions Clubs International Foundation to verify the survey, I can give you that information. Or I can transfer you to an interviewer to complete the survey. If you absolutely do not want us to call again I can take your number out now.”

Refusal Protocol Modification: If the non-selected respondent will not pass the phone to the selected respondent or will not give us a time we may reach the selected respondent, the interviewer must inform the supervisor on duty. After being informed of the situation, the supervisor will decide if she or he agrees with the interviewer’s conclusion that the record should be placed in the refusal conversion study. Once the refusal conversion interviewers or supervisors receive the record, one more attempt will be made to speak with the selected respondent. If this attempt is unsuccessful, the record will be coded “025 Def. Refusal-NS-Refuses to transfer.” The exception to this protocol is if the non-selected respondent is verbally abusive or threatens litigation. In this case, the interviewer will take the record out as a hard refusal.

The number of selected respondent records that will be removed from active calling under this refusal protocol will be relatively small. However, these records will be tracked closely. Project managers may decide to return selected records to active calling on a case-by-case basis, if the possibility of obtaining completes on these records might improve the response rate.

Dealing with Specific Refusal Situations: If the respondent is hesitant or refusing, try some of these approaches:

- I realize we have called you already on behalf of the Lions Clubs International Foundation. I'd like to have a chance to give you a little more information about this study and why we're doing it.
- The results of the KAP survey are used by the press, lawmakers, researchers, and health care professionals.
- The survey is designed to see how the knowledge, attitudes, and practices of adults like you affect risk for eye disease.
- The information will be used to improve programs that promote a healthy lifestyle.
- Your input is important so that policymakers and the health care community can make better decisions in planning health programs.
- We cannot replace you with anybody else. We have a limited number of households that we can contact. When someone does not participate, this makes the results less representative. This is your chance to be represented in policy-making decisions.
- We want to give everyone who was selected a chance to participate.
- The survey is designed to determine the knowledge, attitudes, and practices surrounding various eye health problems. The information goes to doctors, researchers, lawmakers, the press, and policymakers.
- Nothing is ever reported in any way that can identify you. The company I work for, ORC Macro, is very strict about guarding confidentiality. The computer deletes all information that can identify you so it does not go into the report. Results are only reported in group form.
- This is not a political or sales call. Nobody will try to sell you anything as a result of your participation. Many people like you have participated over the years.
- Most people find the survey interesting. We could begin, and if you don't have time to finish it now, we can call later at your convenience.

Handling a contact when you need to interview a selected respondent

- {Read the introduction again and explain.} We are conducting a nationwide study in which we need an equal number of men and women to participate. It is important that we speak to your husband or wife. I will be asking some questions about eye health knowledge, attitudes, and practices. This information is important to guide future program planning, research, and evaluation.

- Don't accept the following: "*He wouldn't be interested in that,*" or "*He hates telephone surveys.*" Explain that it is very important to speak directly with the person who is selected for the study. Sometimes the spouse can become an ally in enlisting the cooperation of the selected respondent. Encourage him or her to explain the purpose of the study and the importance of participating. Try to make an appointment for a more convenient time. If the selected respondent comes to the phone, read the introduction, and ask the first question.

How did you get my phone number? It's unlisted.

- The computer dials telephone numbers at random. The computer has the area codes and prefixes for the areas covered by the study. The computer then dials the last four digits at random. We get all kinds of numbers: fire stations, real estate offices, pay phones, etc. The computer can dial an unlisted number as a matter of pure chance. The study is confidential, and nothing can ever be traced back to you.

I don't know anything about that.

- This isn't a test. We only want to ask about eye health and eye health practices—like eye examinations, if you wear contacts or glasses, etc. Many people find the survey to be interesting.

Why should I participate?

- This data will be used to improve eye health programs and prevent eye diseases. Participating is one way for you to be represented at the federal level. The information is used for planning purposes at all levels of government to develop more effective health programs.
- The more people we have participating, the more accurate the results will be. When you don't participate, it leaves a "hole" in the data.

Why do you need to know how many adults live in the household?

- Our survey protocols require that we select one adult from your household. We ask for the number of men and the number of women, and then the computer randomly selects one person. That way, we can be sure that the study represents all adults in our population: men, women, young, old, etc.

I don't do surveys over the phone. / Put it in the mail.

- We can only conduct this survey over the phone. The Lions Clubs International Foundation, along with the National Eye Institute, believe that this is the most efficient, representative, and thorough method of gathering this information. Many people like you have participated in this survey, and many find it interesting. You can refuse to answer specific questions.

I don't have anything to do with public programs. I get my health care from my private doctor/ HMO/ military.

- All health care providers, public or private, can use the information to improve services, give better advice, and plan better programs.

How long will this take?

If you understand the nature and content of the questions and are prepared to answer any questions that come up in the course of the survey, you will be able to estimate the number of minutes left to complete. Length varies depending on the survey responses. KAP surveys take anywhere from 15-20 minutes. Some examples of responses to this question are:

- “The length of the survey actually depends on your answers to the questions. If you don't have time right now, we can schedule a better time to call you back.”
- We can get started and see how far we get, and if needed, we can schedule a callback to complete the survey at another time.

Refusal Basics

1. Be prepared. Have refusal statements at hand.
2. Remain calm and listen carefully.
3. Look for openings.
4. Acknowledge the concern: “I understand. Let me explain....”
5. Answer the specific concern.
6. Remember, as long as someone is on the line, you have not lost the interview. Keep talking!
7. Listen carefully for a respondent's consent. Once the respondent has agreed to continue, stop the refusal conversion and ask the first or next question.
8. At the completion of the interview, be sure to show genuine and sufficient appreciation for this respondent's participation.

Glossary

- **Amblyopia** (amblee-o-p-ah): also called lazy eye; dimness of sight especially in one eye without apparent change in the eye structures.
- **Cataract** (cat-a-ract): a clouding of the lens in the eye that affects vision. Most cataracts are related to aging.
- **Diabetic retinopathy** (ret-i-nop-a-thy): a complication of diabetes and a leading cause of blindness. It occurs when diabetes damages the tiny blood vessels inside the retina, the light-sensitive tissue at the back of the eye.
- **Glaucoma** (glaw-ko-mah): a group of diseases that can damage the eye's optic nerve and result in vision loss and blindness.
- **Age-related Macular degeneration (AMD)**: a disease that blurs the sharp, central vision you need for “straight-ahead” activities such as reading, sewing, and driving. AMD affects the macula, the part of the eye that allows you to see fine detail.
- **Nearsightedness**: also called myopia; trouble seeing things that are most distant.
- **Farsightedness**: also called hyperopia; trouble seeing things that are close up.

Attachment 1

Spanish

If someone in the household says, “No English,” ask what language is spoken in the household.

Interviews may be conducted in Spanish. Say, “We’ll have an interviewer who speaks Spanish call you back.” These records go to a separate study for Spanish-speaking interviewers. Then code the call as a “definite Spanish”, as appropriate. The record will then be moved to a special study where it will be called by an interviewer who speaks Spanish.

If the language spoken is some other language (Russian, Vietnamese, etc.), use the disposition for “language barrier.” Say, “Thank you for your time.” These records go to the separate study for Comma Four interviewers for verification.

Attachment 2

Comma Four Special Interviewers

The computer automatically assigns records given certain dispositions to an “R” study. (In CfMC, the regular study is a “C” study, C plus three digits.) “R” Studies are then assigned to Special Interviewers. When you are assigned to an “R” study, log in as usual, but after your ID#, use “,4”. Example: 999b,4.

Records with these dispositions are sent to a Comma Four “R” Study:

- Ineligible residence
- Selected respondent unavailable during time period
- No eligible respondent at residence or phone number
- Selected respondent unable to complete due to impairment
- Language barrier
- Refusal: abusive language, threatens lawsuit
- Refusal: record received specified number of refusals

Interviewers who are assigned to “Comma Four” studies are chosen for their excellent interviewing skills, refusal conversion skills, and level of effort and determination in getting completes.

The job of the Comma Four interviewer two-fold:

Ineligible Dispositions: If the record has received an “ineligible” disposition (the first group above), your job is to verify that the disposition given to the record is correct. (Occasionally, these dispositions are used incorrectly.) Probe as necessary; schedule callbacks, if necessary. If it is possible, try to get a complete with the selected respondent on these records. If getting a complete is not possible, assign the correct terminal disposition.

Refusal Conversions: These records have received a specified number of refusals, and/or HUs, or a 129 disposition. The records should show an appropriate call history and message. You should have some idea about who refused and why. Your job is to make a final effort to get a complete on these records.

Why are we calling these records again?

- It’s possible that previous interviewers were less skilled or motivated in attempting refusal conversions. We’re giving our best interviewers a chance to persuade the respondents to participate.

- The rate of refusal is a measure of both interviewer performance and the degree of potential bias in the survey. A lower refusal rate increases the reliability of the data. A lower refusal rate is an indicator that the participants are representative of the entire population.

Is it possible to get a complete when a record has been refused four or five times? Yes, absolutely. Try these approaches:

- You can ask, “Has anyone explained to you what this study is about?” It is possible that in the previous calls, no one has done this.
- Sell yourself on the study. Use the information in this guide, or even on the website, to explain in your own words why participating in the study is important.
- Listen attentively to what the person is saying, and try to pick up cues from the voice.
- Apologize. “I am very sorry if any previous caller was rude to you (or gave you incorrect information, etc.).
- “I’d like to get started and see how far we get. You can refuse to answer any specific question you don’t want to answer.”
- If the person hangs up on you, you may call back and apologize for getting disconnected.
- If it works for you, approach refusal conversion as a challenge and a game. This is the approach of many interviewers who are excellent at dealing with refusals.
- Stay on your toes. Listen hard. Think fast.
- Share what you learn with other interviewers.
- Supervisors: If a person calls the 1-800 line in order to refuse, it is possible for you to convert this refusal into a complete. Give this your best effort.

Attachment 3

Client Contact Information		
Lions Clubs International Foundation	Rebecca Daou	(630) 571-5466 ext.394

Attachment 4

Dispositions

Coding the disposition properly at every attempt is crucial to the quality of the data we collect. On the following page is a chart that shows each disposition with a description of when it should be used.

Use of Quick Dispositioning on the Introduction Screen: The introduction screen offers some dispositions that are faster to use than going to the termination screen. These choices include “no answer–02,” “answering machine–04,” and “hang-up before/during intro–08.” You can get to the termination screen by using “07” if none of the choices offered on the intro screen are appropriate.

Dispositions for Hang-ups:

- Hang-Up Before Intro code as 08
- Hang-Up During/After Intro (which is a refusal): code as 160 or 161
- Before Intro means up to the point where the respondent knows who we are and/or why we are calling. If the respondent knows that you are calling from ORC Macro on behalf of the Lions Clubs International Foundation hanging up, the call should be coded as a refusal.
- It is not necessary to keep track of the number of Hang-Ups; after a specified number of Hang-Ups, the record is automatically moved to the Refusal Study.

Dispositions for Refusals: If the record has not gone through the selection process, *anyone in the household* is a non-selected respondent. If the record has gone through the selection process, anyone *other than* the selected respondent is a non-selected respondent. When a respondent listens to an entire introduction and verbally refuses, use these dispositions:

- Non-Selected Respondent 1st Refusal: code as 161
- Non-Selected Respondent 2nd Refusal: code as 161
 - * (Second use of 161 will move the record to Refusal Study automatically.)
- Selected Respondent Refusal: code as 160
 - * (Refusal by the selected respondent will automatically move the record to the Refusal Study.)
- Swearing: Treat this as a Regular Refusal: code as 161 or 160
- “Take My Number Off Your List” code as 129
 - * (Requires Supervisor password; Will be called once more in Refusal Study)
- Threatening Lawsuit: code as 002
 - * (Available to regular interviewers; Requires Supervisor password in Regular Study.)

Disposition Availability

Who can assign from terminate screen:

R = regular interviewer

S = special interviewer/supervisor

B = both

002	Def. refusal-NS-HANG UP BEFORE INTRO (Available to regular interviewers; Requires Supervisor password in regular study. Leave a message.)	S
003	Language barrier	S
005	Non-working number	B
006	Business phone	B
007	Non-residential, Cellular, Phone booth	S
013	No Adult in Household	S
014	Number changed	B
015	Physical/Mental impairment	S
016	Ineligible residence (Dorm, Barrack)	S
017	No eligible resp. during time period	S
018	Fax machine	B
020	Def. refusal-NS-HANG UP AFTER INTRO	S
025	Def. refusal-NS-Refuses to transfer to selected	S
026	Def. refusal-Selected ref. BEFORE INTRO	S
028	Def. refusal-Selected ref. AFTER INTRO	S
030	Teen/Child Line	S
101	No answer	B
102	Busy	B
104	Scheduled call back (Leave a message.)	B
105	System scheduled call back	B
110	Answering machine (Confirms Residence)	B
111	Ineligible residence (Dorm, Barracks)	R
112	No eligible resp. during time period	R
113	Language barrier	R
114	Physical/Mental impairment	R
115	No Adults in Household	S

116	Definite Spanish	B
117	Privacy manager (Confirms Residence)	B
118	Call block	B
129	Move to refusal study (Supervisor Approval)	B
131	Answering machine (Residence Not Confirmed)	B
132	Privacy manager (Residence Not Confirmed)	B
133	Teen/Child Line	R
157	CLEAR INTERVIEWER TYPE	S
160	Initial refusal	B
161	Non-selected respondent initial refusal	R
178	Temporarily out of service	B

Scheduling Callbacks

Properly scheduling callbacks is essential to maximizing the response rate, achieving target completes, and meeting the KAP survey protocol. For these reasons, guidelines have been established for scheduling callbacks:

- On fresh records (records that have no attempts), use a 105 (system scheduled callback). This allows all records in the fresh sample to receive one attempt. However, if someone *offers a specific time* to reach an adult member of the household, use a 104 (scheduled callback).
- Callbacks should *never* be set for more than five days. If callbacks are set too far in the future, it is not possible to meet the protocol that every record be given 15 attempts.
- If the record has gone through the selection process, use a 104 only if someone offers a *specific time* to reach the *selected respondent*.
- If the selected respondent is unavailable (recovering from surgery, on a vacation, studying for exams, etc.), ask a supervisor to authorize a different callback schedule if the callback is to be more than five days.
- If there is no selected respondent, your goal is to schedule a callback to reach someone who is able to go through the selection process.
- If a respondent has been selected, your goal is to find out when that person is available, and schedule the call for the time most likely to reach that person.
- Use a 104 when you have specific information on when to reach the respondent, or when you are setting an appointment. Use 105 when there is no specific information on when the respondent can be reached.
- Always leave a message with any kind of callback!

Leaving Messages

Always leave a message in the system when the computer prompts you for one!

The only dispositions that require a message are 104 (Scheduled Callback) and 002 (Hard Refusal). On Scheduled Callbacks, think about the information that will be useful for the next caller. All information pertinent to the call should be contained in your message:

- Specifics on the person with whom you spoke: baby-sitter, elderly male, child, etc.
- If the person was busy, going out the door, on another call, along with your assessment of the situation.
- The person's request for a specific callback time.

CAUTION! Remember that the system can only display the *last message entered*. Your message erases any previous messages. It is important to include relevant information from the previous call in your message.

Very Important: Your messages should always be professional in language and content! Never use slang, profanity, or insulting remarks.

Ask a supervisor for the sheet of common messages and abbreviations. Learn this material or have the sheet at your station. Use the standard abbreviations in your messages. A message should follow this format:

Date contact remarks Caller ID#

Message Abbreviations

SM	Selected Male
SF	Selected Female
CFNS	Contacted Female Non-Selected
CMNS	Contacted Male Non-Selected
CKNS	Contacted Kid Non-Selected

NA	Not Available
CB	Call back
REF	Refusal
H/U	Hung-up
RES	Resident
EVE	Evening
MORN	Morning
AFT	Afternoon
REQ	Requested
X	Times
PAR	Parents
SD	Said
SSPND	Suspend

Use these standard abbreviations in messages. Use this format: the **date** and the **message content** and **your id #**.

Please remember that your new message erases previous messages. You must always retype important information from the previous message. After typing the old message, enter the new message with **the date** and your **id #** without brackets. Below are some examples:

Examples of Messages for Call Backs:

1/13 CFNS SD CB FOR SM 1/15 EVE 644S

5/26 SM REQ CB 6:00 5/29 999W

3/25 SF busy now, REQ CB 7:00 EST 999B

Examples of Messages for Refusals:

1/15 SF REF X2, not interested 1/15 101S

9/15 CMNS Refused 3X, send in mail 999B

8/05 SF very angry, REF 3X 999b

NOTES

APPENDIX G

Summary of Non-Response Error Analysis

Summary of Non-response Error Analysis

The non-response error associated with the 2005 KAP survey began with a comparative analysis on key questions. In 2002, the National Health Interview Study asked whether respondents had ever been diagnosed with cataract, glaucoma, diabetic retinopathy, or macular degeneration. While these eye diseases are reported more frequently in the 2005 KAP survey than the NHIS, it is important to note that there are methodological differences between the two studies. The NHIS is a face-to-face study and is not subject to telephone noncoverage bias, which is possible in an RDD study. The questions in the NEI survey also provided definitions of the various eye diseases and conditions, which were not provided in the NHIS.

In order to make comparisons to an RDD benchmark, we looked for differences between the 2005 KAP survey and the 2005 Behavioral Risk Factor Surveillance Survey (BRFSS) wherever possible. We examined differences between the 2005 KAP survey and BRFSS for general health, health care coverage, and prevalence of diabetes, high blood pressure, and arthritis. Of these variables, only the reported frequencies of arthritis and health care coverage were found to be significantly different.

Another analysis that tests for possible non-response bias is a comparison of results by the time period in which a response was received. We theorize that if nonresponse is present, people who are harder to reach will have different characteristics than those who are easy to reach, and that the characteristics of non-responders will more closely mirror the characteristics of late responders than those of early responders.

Respondents were classified into three groups: 1) early responders—those who completed the survey within the first five attempts, 2) middle responders—those who needed 5–10 attempts to complete the survey, and 3) late responders—those who needed 11 or more attempts to complete the survey. Of the 12 eye diseases and conditions, only glaucoma showed a significant difference by respondent type. For glaucoma, early responders were significantly more likely to report a diagnosis of glaucoma than were late responders. There were no significant differences between early and middle or middle and late responders.

Additionally, analysis of non-eye-related variables yielded few significant differences by respondent type. When compared to early responders, late responders were less likely to be in poor health and less likely to have been diagnosed with arthritis. Although the reported rates of arthritis in the 2005 KAP survey and 2005 BRFSS survey were found to be statistically significantly different, non-response is unlikely to be the cause. If non-responders more

resemble late responders than early responders, interviewing more of the non-responders would result in a lower number of reported cases, driving the difference between the two surveys to be even larger.

In summary, we conclude that non-response bias does not seriously compromise the 2005 KAP survey data. Although estimates of the frequency of reported various eye conditions were significantly lower than the estimates reported by the NHIS, we found little evidence of nonresponse bias. Furthermore, there are several key differences in the methodologies that could be factors in any discrepancy found. Most of the non-eye-related conditions that were compared to the BRFSS showed no significant differences. In cases where there were differences, nonresponse did not seem to be a factor.

APPENDIX H

Error Margins for Selected Variables and Item Response Scenarios

Error Margins for Selected Variables and Item Response Scenarios

ENTIRE SAMPLE (including oversample)

pct	meandeff	meanse	margin
10% / 90%	1.38142	0.5%	0.9%
20% / 80%	1.37022	0.9%	1.7%
30% / 70%	1.40754	1.2%	2.3%
40% / 60%	1.38308	1.2%	2.4%
50%	1.38723	1.3%	2.5%

KEY:

Pct = Percent

Meandeff = Mean Design Effect

Meanse = Mean Standard Error

Margin = Mean Margin of Error

AGE

18–24

pct	meandeff	meanse	margin
10% / 90%	1.10855	1.5%	3.0%
20% / 80%	1.27084	3.7%	7.2%
30% / 70%	1.29651	4.7%	9.3%
40% / 60%	1.27344	4.7%	9.2%
50%	1.27268	5.9%	11.6%

25–34

pct	meandeff	meanse	margin
10% / 90%	1.28270	1.1%	2.1%
20% / 80%	1.30106	2.2%	4.4%
30% / 70%	1.32095	2.9%	5.6%
40% / 60%	1.30286	3.4%	6.6%
50%	1.30238	3.3%	6.5%

35–44

pct	meandeff	meanse	Margin
10% / 90%	1.32234	1.0%	2.0%
20% / 80%	1.36219	2.0%	3.9%
30% / 70%	1.36015	2.7%	5.2%
40% / 60%	1.32082	3.1%	6.1%
50%	1.33470	2.9%	5.8%

45–54

pct	meandeff	meanse	margin
10% / 90%	1.27085	0.9%	1.7%
20% / 80%	1.33122	1.8%	3.6%
30% / 70%	1.35100	2.3%	4.6%
40% / 60%	1.35225	2.6%	5.0%
50%	1.34100	2.6%	5.1%

55–64

pct	meandeff	meanse	margin
10% / 90%	1.30311	1.0%	2.0%
20% / 80%	1.35156	2.1%	4.1%
30% / 70%	1.36664	2.8%	5.4%
40% / 60%	1.36178	2.9%	5.6%
50%	1.35606	3.0%	5.8%

65+

pct	meandeff	meanse	margin
10% / 90%	1.27990	0.8%	1.6%
20% / 80%	1.33497	1.8%	3.6%
30% / 70%	1.35695	2.2%	4.4%
40% / 60%	1.34242	2.4%	4.8%
50%	1.34374	2.5%	4.9%

EDUCATION

Less than High School Graduate

pct	meandeff	meanse	margin
10% / 90%	1.14198	1.2%	2.4%
20% / 80%	1.22675	2.6%	5.0%
30% / 70%	1.23093	3.2%	6.2%
40% / 60%	1.26248	3.4%	6.7%
50%	1.25933	3.9%	7.6%

High School Graduate

pct	meandeff	meanse	margin
10% / 90%	1.35246	0.8%	1.6%
20% / 80%	1.34213	1.6%	3.0%
30% / 70%	1.36838	2.1%	4.1%
40% / 60%	1.34241	2.1%	4.2%
50%	1.35545	2.3%	4.5%

Some college

pct	meandeff	meanse	margin
10% / 90%	1.25623	0.8%	1.6%
20% / 80%	1.31935	1.7%	3.4%
30% / 70%	1.34438	2.3%	4.4%
40% / 60%	1.31542	2.4%	4.7%
50%	1.32493	2.4%	4.7%

Bachelor's +

pct	meandeff	meanse	margin
10% / 90%	1.32401	0.7%	1.4%
20% / 80%	1.34304	1.5%	2.9%
30% / 70%	1.37696	2.0%	3.9%
40% / 60%	1.39437	2.1%	4.1%
50%	1.38801	2.2%	4.2%

RACE/ETHNICITY

Asian

pct	meandeff	meanse	margin
10% / 90%	1.94396	2.6%	5.1%
20% / 80%	3.41126	7.3%	14.3%
30% / 70%	3.42589	8.9%	17.4%
40% / 60%	3.45949	9.8%	19.1%
50%	3.45762	10.4%	20.3%

Black

pct	meandeff	meanse	margin
10% / 90%	1.13017	1.7%	3.4%
20% / 80%	1.20798	3.3%	6.5%
30% / 70%	1.21767	4.3%	8.5%
40% / 60%	1.20798	4.5%	8.9%
50%	1.21372	5.1%	9.9%

Hispanic

pct	meandeff	meanse	margin
10% / 90%	1.22411	1.5%	2.9%
20% / 80%	1.32513	2.9%	5.6%
30% / 70%	1.33909	3.7%	7.3%
40% / 60%	1.40052	4.7%	9.2%
50%	1.38359	4.5%	8.9%

White

pct	meandeff	meanse	margin
10% / 90%	1.25652	0.5%	0.9%
20% / 80%	1.25026	1.0%	1.9%
30% / 70%	1.25248	1.3%	2.5%
40% / 60%	1.24906	1.4%	2.7%
50%	1.25146	1.4%	2.7%

Pacific Islander

pct	meandeff	meanse	margin
10% / 90%	0.39851	0.3%	.6%
20% / 80%	3.52794	11.9%	23.4%
30% / 70%	4.60139	20.3%	39.8%
40% / 60%	4.23116	21.7%	42.5%
50%	4.65729	24.8%	48.6%

Other

pct	meandeff	meanse	margin
10% / 90%	1.30373	2.0%	4.0%
20% / 80%	1.68302	4.6%	9.0%
30% / 70%	1.63048	5.6%	11.0%
40% / 60%	1.64689	6.1%	11.9%
50%	1.67042	6.4%	12.5%

GENDER

Female

pct	meandeff	meanse	margin
10% / 90%	1.34283	0.5%	1.1%
20% / 80%	1.36400	1.1%	2.2%
30% / 70%	1.37347	1.5%	2.9%
40% / 60%	1.38229	1.6%	3.1%
50%	1.38061	1.6%	3.2%

Male

pct	meandeff	meanse	margin
10% / 90%	1.33047	0.7%	1.4%
20% / 80%	1.36557	1.4%	2.7%
30% / 70%	1.39390	1.8%	3.5%
40% / 60%	1.35534	2.0%	3.9%
50%	1.36545	2.0%	4.0%

APPENDIX I

**Frequency Distributions of 2005 KAP Variables:
Adults 18 Years and Older (weighted)**

Frequency Distributions of 2005 KAP Variables: Adults 18 Years and Older (weighted)

Section 1: General Health

Q1 IN GENERAL, WOULD YOU SAY YOUR HEALTH IS:

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	EXCELLENT	576	18.1	18.1	18.1
	VERY GOOD	1139	35.8	35.9	54.0
	GOOD	919	28.9	28.9	83.0
	FAIR OR	381	12.0	12.0	95.0
	POOR	160	5.0	5.0	100.0
	Total	3174	99.8	100.0	
Missing	DON'T KNOW/NOT SURE	3	.1		
	REFUSED	3	.1		
	Total	6	.2		
	Total	3180	100.0		

Q2 ABOUT HOW LONG AGO WAS THE LAST TIME YOU SAW OR VISITED A HEALTH CARE PROVIDER?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	WITHIN THE PAST MONTH	1293	40.7	40.9	40.9
	WITHIN THE PAST YEAR	1451	45.6	45.9	86.7
	WITHIN THE PAST 2 YEARS	194	6.1	6.1	92.9
	2 OR MORE YEARS AGO	218	6.9	6.9	99.8
	NEVER \LSP	7	.2	.2	100.0
	Total	3165	99.5	100.0	
Missing	DON'T KNOW/NOT SURE	10	.3		
	REFUSED	5	.2		
	Total	15	.5		
Total	3180	100.0			

Q3A HAVE YOU EVER BEEN TOLD BY A HEALTH CARE PROVIDER THAT YOU HAVE DIABETES?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	300	9.4	9.5	9.5
	NO	2874	90.4	90.5	100.0
	Total	3175	99.8	100.0	
Missing	DON'T KNOW	3	.1		
	REFUSED	3	.1		
	Total	5	.2		
Total	3180	100.0			

Q3B HAVE YOU EVER BEEN TOLD BY A HEALTH CARE PROVIDER THAT YOU HAVE HIGH BLOOD PRESSURE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	857	27.0	27.0	27.0
	NO	2316	72.8	73.0	100.0
	Total	3174	99.8	100.0	
Missing	DON'T KNOW	4	.1		
	REFUSED	3	.1		
	Total	6	.2		
Total		3180	100.0		

Q3C HAVE YOU EVER BEEN TOLD BY A HEALTH CARE PROVIDER THAT YOU HAVE HEART DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	226	7.1	7.1	7.1
	NO	2939	92.4	92.9	100.0
	Total	3165	99.5	100.0	
Missing	DON'T KNOW	12	.4		
	REFUSED	3	.1		
	Total	15	.5		
Total		3180	100.0		

Q3D HAVE YOU EVER BEEN TOLD BY A HEALTH CARE PROVIDER THAT YOU HAVE ARTHRITIS?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	671	21.1	21.2	21.2
	NO	2493	78.4	78.8	100.0
	Total	3165	99.5	100.0	
Missing	DON'T KNOW	11	.4		
	REFUSED	4	.1		
	Total	15	.5		
Total		3180	100.0		

Q3E HAVE YOU EVER BEEN TOLD BY A HEALTH CARE PROVIDER THAT YOU HAVE CANCER?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	200	6.3	6.3	6.3
	NO	2975	93.6	93.7	100.0
	Total	3175	99.8	100.0	
Missing	DON'T KNOW	2	.1		
	REFUSED	3	.1		
	Total	5	.2		
Total		3180	100.0		

Q4A ARE YOU SEEKING OR RECEIVING TREATMENT OR HAVE YOU RECEIVED TREATMENT IN THE PAST FOR DIABETES FROM A HEALTH CARE PR

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	255	8.0	84.9	84.9
	NO	45	1.4	15.1	100.0
	Total	300	9.4	100.0	
Missing	System	2880	90.6		
	Total	3180	100.0		

Q4B ARE YOU SEEKING OR RECEIVING TREATMENT OR HAVE YOU RECEIVED TREATMENT IN THE PAST FOR HIGH BLOOD PRESSURE FROM A HEA

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	704	22.1	82.1	82.1
	NO	153	4.8	17.9	100.0
	Total	857	27.0	100.0	
Missing	DON'T KNOW	0	.0		
	System	2323	73.0		
	Total	2323	73.0		
Total		3180	100.0		

Q4C ARE YOU SEEKING OR RECEIVING TREATMENT OR HAVE YOU RECEIVED TREATMENT IN THE PAST FOR \BHEART DISEASE\E FROM A HEALT

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	194	6.1	86.0	86.0
	NO	32	1.0	14.0	100.0
	Total	225	7.1	100.0	
Missing	DON'T KNOW	1	.0		
	System	2954	92.9		
	Total	2955	92.9		
Total		3180	100.0		

Q4D ARE YOU SEEKING OR RECEIVING TREATMENT OR HAVE YOU RECEIVED TREATMENT IN THE PAST FOR \BARTHRTIS\E FROM A HEALTH CA

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	416	13.1	62.2	62.2
	NO	253	8.0	37.8	100.0
	Total	669	21.0	100.0	
Missing	DON'T KNOW	2	.1		
	System	2509	78.9		
	Total	2511	79.0		
Total		3180	100.0		

Q4E ARE YOU SEEKING OR RECEIVING TREATMENT OR HAVE YOU RECEIVED TREATMENT IN THE PAST FOR \BCANCER\E FROM A HEALTH CARE

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	164	5.1	81.8	81.8
	NO	36	1.1	18.2	100.0
	Total	200	6.3	100.0	
Missing	System	2980	93.7		
Total		3180	100.0		

Q5A HOW WOULD YOU RATE LOSING YOUR MEMORY?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1	121	3.8	3.9	3.9
	2	34	1.1	1.1	5.0
	3	37	1.2	1.2	6.1
	4	15	.5	.5	6.6
	5	158	5.0	5.0	11.7
	6	60	1.9	1.9	13.6
	7	83	2.6	2.7	16.2
	8	231	7.3	7.4	23.6
	9	252	7.9	8.0	31.6
	10	2144	67.4	68.4	100.0
Total		3135	98.6	100.0	
Missing	77	40	1.3		
	99	5	.2		
	Total	45	1.4		
Total		3180	100.0		

Q5B HOW WOULD YOU RATE LOSING YOUR HEARING?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1	139	4.4	4.4	4.4
	2	52	1.6	1.7	6.1
	3	49	1.5	1.5	7.6
	4	50	1.6	1.6	9.2
	5	285	9.0	9.1	18.3
	6	182	5.7	5.8	24.1
	7	334	10.5	10.6	34.7
	8	564	17.7	17.9	52.6
	9	279	8.8	8.9	61.5
	10	1211	38.1	38.5	100.0
Total		3145	98.9	100.0	
Missing	77	31	1.0		
	99	5	.1		
	Total	35	1.1		
Total		3180	100.0		

Q5C HOW WOULD YOU RATE LOSING YOUR EYESIGHT?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1	108	3.4	3.4	3.4
	2	21	.7	.7	4.1
	3	31	1.0	1.0	5.1
	4	24	.8	.8	5.9
	5	80	2.5	2.5	8.4
	6	37	1.2	1.2	9.6
	7	76	2.4	2.4	12.0
	8	239	7.5	7.6	19.6
	9	284	8.9	9.0	28.6
	10	2247	70.7	71.4	100.0
	Total	3146	98.9	100.0	
Missing	77	31	1.0		
	99	3	.1		
	Total	34	1.1		
Total		3180	100.0		

Q5D HOW WOULD YOU RATE LOSING YOUR SPEECH?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1	167	5.3	5.3	5.3
	2	34	1.1	1.1	6.4
	3	52	1.6	1.7	8.1
	4	46	1.5	1.5	9.5
	5	354	11.1	11.2	20.8
	6	146	4.6	4.6	25.4
	7	275	8.6	8.7	34.2
	8	434	13.6	13.8	47.9
	9	295	9.3	9.4	57.3
	10	1342	42.2	42.7	100.0
	Total	3146	98.9	100.0	
Missing	77	31	1.0		
	99	4	.1		
	Total	34	1.1		
Total		3180	100.0		

HOW WOULD YOU RATE LOSING AN ARM OR A LEG?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1	171	5.4	5.4	5.4
	2	41	1.3	1.3	6.7
	3	60	1.9	1.9	8.6
	4	60	1.9	1.9	10.6
	5	369	11.6	11.8	22.3
	6	157	5.0	5.0	27.3
	7	307	9.7	9.8	37.1
	8	462	14.5	14.7	51.9
	9	241	7.6	7.7	59.6
	10	1268	39.9	40.4	100.0
	Total	3135	98.6	100.0	
Missing	77	41	1.3		
	99	4	.1		
	Total	45	1.4		
Total		3180	100.0		

Section 2: Eye Health

Q6_A 1st RESPONSE DO YOU WEAR ...?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	GLASSES	1273	40.0	40.0	40.0
	CONTACT LENSES	70	2.2	2.2	42.2
	BOTH GLASSES AND CONTACT LENSES	314	9.9	9.9	52.1
	READING GLASSES ONLY, OR	447	14.1	14.1	66.2
	NONE OF THE ABOVE	1073	33.8	33.8	100.0
	Total	3178	99.9	100.0	
Missing	DON'T KNOW / NOT SURE	0	.0		
	REFUSED	2	.1		
	Total	2	.1		
Total		3180	100.0		

Q6_B 2nd RESPONSE DO YOU WEAR ...?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	GLASSES	0	.0	.0	.0
	CONTACT LENSES	2	.1	11.0	11.0
	READING GLASSES ONLY, OR	18	.6	89.0	100.0
	Total	20	.6	100.0	
Missing	System	3160	99.4		
Total		3180	100.0		

Q7 DID AN EYE CARE PROVIDER PRESCRIBE OR RECOMMEND THE GLASSES OR CONTACT LENSES YOU CURRENTLY WEAR?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	1938	60.9	92.2	92.2
	NO	163	5.1	7.8	100.0
	Total	2101	66.1	100.0	
Missing	DON'T KNOW / NOT SURE	3	.1		
	System	1076	33.8		
	Total	1079	33.9		
Total		3180	100.0		

Q8 AT THE PRESENT TIME, WOULD YOU SAY YOUR EYESIGHT, WITH GLASSES OR CONTACT LENSES WHEN YOU WEAR THEM, IS ...?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	EXCELLENT	556	17.5	26.5	26.5
	VERY GOOD	817	25.7	38.9	65.4
	GOOD	525	16.5	25.0	90.5
	FAIR OR	144	4.5	6.9	97.4
	POOR	55	1.7	2.6	100.0
	Total	2098	66.0	100.0	
Missing	DON'T KNOW/NOT SURE	6	.2		
	System	1076	33.8		
	Total	1082	34.0		
Total		3180	100.0		

Q9 WOULD YOU SAY YOUR EYESIGHT IS ...?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	EXCELLENT	360	11.3	33.5	33.5
	VERY GOOD	321	10.1	29.9	63.4
	GOOD	259	8.2	24.2	87.6
	FAIR OR	108	3.4	10.1	97.7
	POOR	24	.8	2.3	100.0
	Total	1073	33.7	100.0	
Missing	DON'T KNOW/NOT SURE \LS.	0	.0		
	REFUSED \LSP(DO NOT REA.	2	.1		
	System	2104	66.2		
	Total	2107	66.3		
Total		3180	100.0		

Q10A DO YOU WEAR YOUR GLASSES OR CONTACT LENSES TO SEE THINGS THAT ARE CLOSE UP?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	1563	49.1	74.6	74.6
	NO	532	16.7	25.4	100.0
	Total	2095	65.9	100.0	
Missing	DON'T KNOW / NOT SURE	7	.2		
	REFUSED	2	.1		
	System	1076	33.8		
Total		1085	34.1		
Total		3180	100.0		

Q10B DO YOU WEAR YOUR GLASSES OR CONTACT LENSES TO SEE THINGS AT AN INTERMEDIATE DISTANCE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	1238	38.9	59.3	59.3
	NO	851	26.8	40.7	100.0
	Total	2089	65.7	100.0	
Missing	DON'T KNOW / NOT SURE	15	.5		
	System	1076	33.8		
	Total	1091	34.3		
Total		3180	100.0		

Q10C DO YOU WEAR YOUR GLASSES OR CONTACT LENSES TO SEE THINGS THAT ARE MORE DISTANT?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	1478	46.5	70.5	70.5
	NO	619	19.4	29.5	100.0
	Total	2096	65.9	100.0	
Missing	DON'T KNOW / NOT SURE	8	.2		
	System	1076	33.8		
	Total	1084	34.1		
Total		3180	100.0		

Q11 HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE AN EYE CONDITION OR DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	700	22.0	22.2	22.2
	NO	2455	77.2	77.8	100.0
	Total	3155	99.2	100.0	
Missing	DON'T KNOW / NOT SURE	22	.7		
	REFUSED	2	.1		
	Total	25	.8		
Total		3180	100.0		

Q12A HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE AMBLYOPIA (AMBLEE-O-P-AH)?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	277	8.7	8.7	8.7
	NO	2884	90.7	91.3	100.0
	Total	3160	99.4	100.0	
Missing	DON'T KNOW / NOT SURE	17	.5		
	REFUSED	2	.1		
	Total	20	.6		
Total		3180	100.0		

Q12B HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE CATARACT?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	399	12.6	12.6	12.6
	NO	2770	87.1	87.4	100.0
	Total	3169	99.7	100.0	
Missing	DON'T KNOW / NOT SURE	8	.3		
	REFUSED	2	.1		
	Total	11	.3		
Total		3180	100.0		

Q12C HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE DIABETIC RETINOPATHY OR DIABETIC EYE DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	43	1.4	1.4	1.4
	NO	3122	98.2	98.6	100.0
	Total	3165	99.5	100.0	
Missing	DON'T KNOW / NOT SURE	12	.4		
	REFUSED	2	.1		
	Total	15	.5		
Total		3180	100.0		

Q12D HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE GLAUCOMA?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	106	3.3	3.3	3.3
	NO	3061	96.3	96.7	100.0
	Total	3167	99.6	100.0	
Missing	DON'T KNOW / NOT SURE	10	.3		
	REFUSED	2	.1		
	Total	13	.4		
Total		3180	100.0		

Q12E HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU ARE SUSPECT FOR GLAUCOMA?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	109	3.4	3.6	3.6
	NO	2936	92.3	96.4	100.0
	Total	3045	95.8	100.0	
Missing	DON'T KNOW / NOT SURE	16	.5		
	System	119	3.7		
	Total	135	4.2		
Total		3180	100.0		

Q12F HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE AGE-RELATED MACULAR DEGENERATION?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	113	3.6	3.6	3.6
	NO	3030	95.3	96.4	100.0
	Total	3143	98.9	100.0	
Missing	DON'T KNOW / NOT SURE	34	1.1		
	REFUSED	2	.1		
	Total	37	1.1		
Total		3180	100.0		

Q12G HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE BNEARSIGHTEDNESS?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	1209	38.0	38.5	38.5
	NO	1927	60.6	61.5	100.0
	Total	3135	98.6	100.0	
Missing	DON'T KNOW / NOT SURE	42	1.3		
	REFUSED	2	.1		
	Total	45	1.4		
Total		3180	100.0		

Q12H HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE FARSIGHTEDNESS?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	937	29.5	30.0	30.0
	NO	2189	68.8	70.0	100.0
	Total	3126	98.3	100.0	
Missing	DON'T KNOW / NOT SURE	51	1.6		
	REFUSED	2	.1		
	Total	54	1.7		
Total		3180	100.0		

Q12I HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE ANY OTHER EYE DISEASE OR CONDITION?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	165	5.2	5.2	5.2
	NO	2996	94.2	94.8	100.0
	Total	3160	99.4	100.0	
Missing	DON'T KNOW / NOT SURE	14	.4		
	REFUSED	5	.2		
	Total	20	.6		
Total		3180	100.0		

Q12J HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE ASTIGMATISM?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	130	4.1	100.0	100.0
Missing	System	3050	95.9		
Total		3180	100.0		

Q13A ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR AMBLYOPIA (AMBLEE-O-P-AH)?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	101	3.2	36.5	36.5
	NO	175	5.5	63.5	100.0
	Total	277	8.7	100.0	
Missing	System	2903	91.3		
Total		3180	100.0		

Q13C ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR DIABETIC RETINOPATHY?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	27	.9	66.3	66.3
	NO	14	.4	33.7	100.0
	Total	41	1.3	100.0	
Missing	DON'T KNOW / NOT SURE	2	.1		
	System	3137	98.6		
	Total	3139	98.7		
Total		3180	100.0		

Q13B ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR CATARACT?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	250	7.9	62.9	62.9
	NO	147	4.6	37.1	100.0
	Total	397	12.5	100.0	
Missing	DON'T KNOW / NOT SURE	2	.1		
	REFUSED	0	.0		
	System	2781	87.4		
Total		2783	87.5		
Total		3180	100.0		

Q13D ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR GLAUCOMA?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	84	2.6	79.4	79.4
	NO	22	.7	20.6	100.0
	Total	106	3.3	100.0	
Missing	REFUSED	0	.0		
	System	3074	96.7		
	Total	3074	96.7		
Total		3180	100.0		

Q13E ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR SUSPECT FOR GLUACOMA?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	59	1.9	54.4	54.4
	NO	50	1.6	45.6	100.0
	Total	109	3.4	100.0	
Missing	System	3071	96.6		
Total		3180	100.0		

Q13F ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR AGE-RELATED MACULAR DEGENERATION?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	64	2.0	57.1	57.1
	NO	48	1.5	42.9	100.0
	Total	112	3.5	100.0	
Missing	DON'T KNOW / NOT SURE	2	.1		
	System	3067	96.4		
	Total	3068	96.5		
Total		3180	100.0		

Q13G ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR NEARSIGHTEDNESS?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	866	27.2	71.9	71.9
	NO	338	10.6	28.1	100.0
	Total	1203	37.8	100.0	
Missing	DON'T KNOW / NOT SURE	5	.2		
	REFUSED	0	.0		
	System	1971	62.0		
Total		1977	62.2		
Total		3180	100.0		

Q13H ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR FARSIGHTEDNESS?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	594	18.7	63.6	63.6
	NO	340	10.7	36.4	100.0
	Total	934	29.4	100.0	
Missing	DON'T KNOW / NOT SURE	3	.1		
	System	2243	70.5		
	Total	2246	70.6		
Total		3180	100.0		

Q13I ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR SOME OTHER CONDITION?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	94	3.0	57.4	57.4
	NO	70	2.2	42.6	100.0
	Total	164	5.2	100.0	
Missing	DON'T KNOW / NOT SURE	1	.0		
	System	3015	94.8		
	Total	3016	94.8		
Total		3180	100.0		

Q13J ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR ASTIGMATISM?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	71	2.2	54.9	54.9
	NO	58	1.8	45.1	100.0
	Total	130	4.1	100.0	
Missing	System	3050	95.9		
Total		3180	100.0		

Q14 HAVE YOU EVER HAD AN EYE INJURY OR TRAUMA REQUIRING A DOCTOR'S CARE IN THE EMERGENCY ROOM OR AT A DOCTOR'S OFFICE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	595	18.7	18.8	18.8
	NO	2575	81.0	81.2	100.0
	Total	3170	99.7	100.0	
Missing	DON'T KNOW / NOT SURE	4	.1		
	REFUSED	5	.2		
	Total	10	.3		
Total		3180	100.0		

Q15_A 1st RESPONSE - FOR THE LAST EYE INJURY OR TRAUMA THAT YOU CAN REMEMBER, HOW DID IT OCCUR?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	PLAYING SPORTS/ RECREATIONAL ACTIVITY	69	2.2	11.8	11.8
	WORKING ON A HOBBY	43	1.3	7.4	19.2
	AT YOUR JOB OR IN THE WORKPLACE	114	3.6	19.7	38.9
	IN A MOTOR VEHICLE	26	.8	4.5	43.5
	WHILE GARDENING/LAWN CARE	18	.6	3.1	46.6
	IN THE HOME	81	2.6	14.0	60.6
	OTHER(S) (SPECIFY)	229	7.2	39.4	100.0
	Total	580	18.2	100.0	
Missing	DON'T KNOW / NOT SURE	15	.5		
	System	2585	81.3		
Total		2600	81.8		
Total		3180	100.0		

Q16 HAVE YOU EXPERIENCED A PERMANENT CHANGE IN YOUR VISION OR PERMANENT LOSS BECAUSE OF THIS INJURY OR TRAUMA?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	68	2.1	11.5	11.5
	NO	520	16.3	88.5	100.0
	Total	587	18.5	100.0	
Missing	DON'T KNOW / NOT SURE	8	.2		
	System	2585	81.3		
Total		2593	81.5		
Total		3180	100.0		

Q17 DID YOU HAVE TO STAY IN A HOSPITAL OVERNIGHT OR LONGER BECAUSE OF THIS INJURY OR TRAUMA?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	59	1.9	10.0	10.0
	NO	533	16.8	90.0	100.0
	Total	592	18.6	100.0	
Missing	DON'T KNOW / NOT SURE	2	.1		
	REFUSED	1	.0		
	System Total	2585	81.3		
Total		3180	100.0		

Section 3: Eye Examinations: Experiences and Attitudes

Q18 HAVE YOU EVER HAD YOUR EYES EXAMINED BY A HEALTH CARE PROVIDER?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	2895	91.1	91.3	91.3
	NO	275	8.6	8.7	100.0
	Total	3171	99.7	100.0	
Missing	DON'T KNOW / NOT SURE	4	.1		
	REFUSED	5	.2		
	System Total	9	.3		
Total		3180	100.0		

Q19 WERE YOUR PUPILS DILATED?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	2143	67.4	76.3	76.3
	NO	667	21.0	23.7	100.0
	Total	2810	88.4	100.0	
Missing	DON'T KNOW / NOT SURE	86	2.7		
	System	285	8.9		
	Total	370	11.6		
Total		3180	100.0		

Q20 WHEN YOU TYPICALLY HAVE YOUR EYES EXAMINED, WHO EXAMINES THEM?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	AN EYE CARE PROVIDER	2448	77.0	86.1	86.1
	YOUR PRIMARY CARE PROVIDER	329	10.4	11.6	97.7
	SOMEONE ELSE (SPECIFY)	65	2.0	2.3	100.0
	Total	2842	89.4	100.0	
Missing	DON'T KNOW / NOT SURE	49	1.6		
	REFUSED	4	.1		
	System Total	285	8.9		
Total		338	10.6		
Total		3180	100.0		

Q21 WHEN WAS THE LAST EYE EXAMINATION YOU HAD BY AN EYE CARE PROVIDER SUCH AS AN OPHTHALMOLOGIST OR OPTOMETRIST?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	WITHIN THE PAST MONTH	278	8.7	9.7	9.7
	WITHIN THE PAST YEAR	1367	43.0	47.6	57.3
	WITHIN THE PAST 2 YEARS	481	15.1	16.7	74.0
	2 OR MORE YEARS AGO	678	21.3	23.6	97.6
	NEVER	68	2.1	2.4	100.0
Missing	Total	2872	90.3	100.0	
	DON'T KNOW/NOT SURE	21	.6		
	REFUSED	3	.1		
	System	285	8.9		
	Total	308	9.7		
Total		3180	100.0		

Q22 WHAT WAS THE ONE MAIN REASON YOU HAD YOUR EYES EXAMINED THE LAST TIME BY AN EYE CARE PROVIDER?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	FOR A REGULAR CHECK UP	1448	45.5	51.6	51.6
	YOU NEEDED NEW EYE GLASSES OR CONTACT.	475	14.9	16.9	68.6
	YOU HAD TROUBLE-SEEING	360	11.3	12.8	81.4
	YOU HAD PAIN IN YOUR EYES	29	.9	1.0	82.5
	YOU HAD HEADACHES	76	2.4	2.7	85.2
	YOU HAD AN EYE INFECTION, INJURY, OR EYE DISEASE.	113	3.5	4.0	89.2
	YOU RECEIVED A NOTICE FROM YOUR EYE CARE PROVIDER.	34	1.1	1.2	90.4
	A FAMILY MEMBER OR A FRIEND SUGGESTED.	25	.8	.9	91.3
	YOU WERE REFERRED BY ANOTHER HEALTH CARE PROVIDER.	23	.7	.8	92.1
	SOME OTHER REASON (SPECIFY)	191	6.0	6.8	98.9
	DON'T KNOW / NOT SURE	30	.9	1.1	100.0
	Total	2804	88.2	100.0	
Missing	System	376	11.8		
Total		3180	100.0		

Q23 IS THERE A PARTICULAR OR ONE MAIN REASON WHY YOU HAVE NEVER HAD YOUR EYES EXAMINED BY AN EYE CARE PROVIDER?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	I HAVEN'T HAD ANY PROBLEMS AND HAVEN'T FELT THE NEED.	207	6.5	60.1	60.1
	MY PRIMARY CARE PROVIDER HAS NOT TOLD TO HAVE AN EXAM.	5	.2	1.5	61.6
	I CAN GET ALONG WELL ENOUGH WITH MY EYE PROBLEM.	1	.0	.4	62.0
	I DON'T LIKE DOCTORS AND AVOID THEM	0	.0	.1	62.1
	I DON'T WANT TO KNOW IF SOMETHING IS WRONG	1	.0	.2	62.3
	I WOULD LOSE TIME FROM MY WORK	0	.0	.0	62.4
	THE EXAMINATION COSTS TOO MUCH	16	.5	4.5	66.9
	NOT COVERED BY INSURANCE	26	.8	7.6	74.5
	THERE ARE NO PLACES OR DOCTORS CLOSE .	0	.0	.1	74.6
	I AM NOT SURE WHERE TO GO TO HAVE AN EYE EXAM.	2	.1	.7	75.3
	NO TIME, NEVER GOT AROUND TO IT	11	.4	3.2	78.5
	NEVER THOUGHT ABOUT IT	26	.8	7.5	86.1
	OTHER (SPECIFY)	20	.6	5.7	91.8
	DON'T KNOW / NOT SURE	28	.9	8.2	100.0
	Total	344	10.8	100.0	
Missing	REFUSED	8	.2		
	System	2828	88.9		
	Total	2836	89.2		
Total		3180	100.0		

Q24A IF FAMILY MEMBERS SAID THAT YOU NEEDED TO HAVE YOUR EYES EXAMINED, HOW LIKELY WOULD IT BE THAT YOU WOULD HAVE AN EY

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	VERY LIKELY	1095	34.4	34.8	34.8
	SOMEWHAT LIKELY	1382	43.5	43.9	78.7
	NOT LIKELY AT ALL	670	21.1	21.3	100.0
	Total	3147	99.0	100.0	
Missing	DON'T KNOW/DEPENDS	19	.6		
	REFUSED	14	.5		
	Total	33	1.0		
Total		3180	100.0		

Q24B IF YOUR PRIMARY CARE PROVIDER SAID THAT YOU NEEDED TO HAVE YOUR EYES EXAMINED, HOW LIKELY WOULD IT BE THAT YOU WOU

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	VERY LIKELY	2545	80.0	80.8	80.8
	SOMEWHAT LIKELY	466	14.6	14.8	95.6
	NOT LIKELY AT ALL	138	4.4	4.4	100.0
	Total	3149	99.0	100.0	
Missing	DON'T KNOW/DEPENDS	18	.6		
	REFUSED	12	.4		
	Total	31	1.0		
Total		3180	100.0		

Q24C IF YOUR PHARMACIST SAID THAT YOU NEEDED TO HAVE YOUR EYES EXAMINED, HOW LIKELY WOULD IT BE THAT YOU WOULD HAVE AN

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	VERY LIKELY	740	23.3	23.9	23.9
	SOMEWHAT LIKELY	1057	33.2	34.1	57.9
	NOT LIKELY AT ALL	1306	41.1	42.1	100.0
	Total	3103	97.6	100.0	
Missing	DON'T KNOW/DEPENDS	65	2.0		
	REFUSED	13	.4		
	Total	77	2.4		
Total		3180	100.0		

Q24D IF YOUR FRIENDSE SAID THAT YOU NEEDED TO HAVE YOUR EYES EXAMINED, HOW LIKELY WOULD IT BE THAT YOU WOULD HAVE AN EYE

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	VERY LIKELY	494	15.5	15.7	15.7
	SOMEWHAT LIKELY	1273	40.0	40.5	56.2
	NOT LIKELY AT ALL	1376	43.3	43.8	100.0
	Total	3143	98.8	100.0	
Missing	DON'T KNOW/DEPENDS	27	.8		
	REFUSED	11	.3		
	Total	37	1.2		
Total		3180	100.0		

Q24E IF CO-WORKERS/EMPLOYER SAID THAT YOU NEEDED TO HAVE YOUR EYES EXAMINED, HOW LIKELY WOULD IT BE THAT YOU WOULD HAVE

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	VERY LIKELY	830	26.1	26.8	26.8
	SOMEWHAT LIKELY	1277	40.2	41.3	68.1
	NOT LIKELY AT ALL	987	31.0	31.9	100.0
	Total	3095	97.3	100.0	
Missing	DON'T KNOW/DEPENDS	68	2.1		
	REFUSED	17	.5		
	Total	85	2.7		
Total		3180	100.0		

Q24F IF RELIGIOUS LEADER SAID THAT YOU NEEDED TO HAVE YOUR EYES EXAMINED, HOW LIKELY WOULD IT BE THAT YOU WOULD HAVE AN

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	VERY LIKELY	409	12.9	13.1	13.1
	SOMEWHAT LIKELY	929	29.2	29.8	42.9
	NOT LIKELY AT ALL	1777	55.9	57.1	100.0
	Total	3115	98.0	100.0	
Missing	DON'T KNOW/DEPENDS	49	1.5		
	REFUSED	16	.5		
	Total	65	2.0		
Total		3180	100.0		

Section 4: Knowledge of Eye Disease

Q25 HAVE YOU EVER HEARD OF GLAUCOMA?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	2868	90.2	90.3	90.3
	NO	302	9.5	9.5	99.8
	DON'T KNOW / NOT SURE	6	.2	.2	100.0
	Total	3175	99.8	100.0	
Missing	REFUSED	5	.2		
Total		3180	100.0		

Q26A TRUE OR FALSE.- GLAUCOMA CAN CAUSE VISION LOSS?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	TRUE	2643	83.1	92.2	92.2
	FALSE	21	.6	.7	92.9
	DON'T KNOW/NOT SURE	203	6.4	7.1	100.0
	Total	2867	90.2	100.0	
Missing	REFUSED	1	.0		
	System	312	9.8		
	Total	313	9.8		
Total		3180	100.0		

Q26C TRUE OR FALSE.- THERE ARE EARLY WARNING SYMPTOMS FOR GLAUCOMA?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	TRUE	1904	59.9	66.4	66.4
	FALSE	231	7.3	8.0	74.5
	DON'T KNOW/NOT SURE	732	23.0	25.5	100.0
	Total	2867	90.2	100.0	
Missing	REFUSED	1	.0		
	System	312	9.8		
	Total	313	9.8		
Total		3180	100.0		

Q26C TRUE OR FALSE - VISION LOSS FROM GLAUCOMA CAN BE PREVENTED?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	TRUE	1914	60.2	66.8	66.8
	FALSE	249	7.8	8.7	75.5
	DON'T KNOW/NOT SURE	703	22.1	24.5	100.0
	Total	2866	90.1	100.0	
Missing	REFUSED	1	.0		
	System	312	9.8		
	Total	314	9.9		
Total		3180	100.0		

Q26D TRUE OR FALSE.- GLAUCOMA CAN BE TREATED?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	TRUE	2462	77.4	85.9	85.9
	FALSE	91	2.9	3.2	89.0
	DON'T KNOW/NOT SURE	314	9.9	11.0	100.0
	Total	2867	90.2	100.0	
Missing	REFUSED	1	.0		
	System	312	9.8		
	Total	313	9.8		
Total		3180	100.0		

Q27 HAVE YOU EVER HEARD OF AGE-RELATED MACULAR DEGENERATION?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	1643	51.7	51.7	51.7
	NO	1489	46.8	46.9	98.6
	DON'T KNOW/NOT SURE	43	1.3	1.4	100.0
	Total	3175	99.8	100.0	
Missing	REFUSED	5	.2		
Total		3180	100.0		

Q28A TRUE OR FALSE. - VITAMINS AND ZINC CAN HELP PREVENT VISION LOSS FROM AMD IN SOME PEOPLE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	TRUE	756	23.8	46.0	46.0
	FALSE	130	4.1	7.9	53.9
	DON'T KNOW/NOT SURE	757	23.8	46.1	100.0
	Total	1643	51.7	100.0	
Missing	System	1537	48.3		
Total		3180	100.0		

Q28B TRUE OR FALSE. - AMD USUALLY RUNS IN FAMILIES?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	TRUE	678	21.3	41.3	41.3
	FALSE	198	6.2	12.1	53.4
	DON'T KNOW/NOT SURE	765	24.1	46.6	100.0
	Total	1641	51.6	100.0	
Missing	REFUSED	3	.1		
	System	1537	48.3		
	Total	1539	48.4		
Total		3180	100.0		

Q28C TRUE OR FALSE - A PERSON CAN HAVE AMD AND NOT KNOW IT?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	TRUE	1112	35.0	67.7	67.7
	FALSE	179	5.6	10.9	78.5
	DON'T KNOW/NOT SURE	353	11.1	21.5	100.0
	Total	1643	51.7	100.0	
Missing	System	1537	48.3		
Total		3180	100.0		

Q28D TRUE OR FALSE. - AMD CAN CAUSE CENTRAL VISION LOSS?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	TRUE	1158	36.4	70.5	70.5
	FALSE	54	1.7	3.3	73.8
	DON'T KNOW/NOT SURE	431	13.6	26.2	100.0
	Total	1643	51.7	100.0	
Missing	System	1537	48.3		
Total		3180	100.0		

Q29 HAVE YOU EVER HEARD OF DIABETIC EYE DISEASE SUCH AS DIABETIC RETINOPATHY?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	1608	50.6	50.6	50.6
	NO	1508	47.4	47.5	98.1
	DON'T KNOW / NOT SURE	60	1.9	1.9	100.0
	Total	3175	99.8	100.0	
Missing	REFUSED	5	.2		
Total		3180	100.0		

Q30A TRUE OR FALSE. - PEOPLE WITH DIABETES ARE AT HIGHER RISK FOR EYE DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	TRUE	1471	46.3	91.5	91.5
	FALSE	57	1.8	3.6	95.1
	DON'T KNOW/NOT SURE	79	2.5	4.9	100.0
	Total	1608	50.6	100.0	
Missing	System	1572	49.4		
Total		3180	100.0		

Q30B TRUE OR FALSE. - EYE DISEASE CAUSED BY DIABETES USUALLY HAS EARLY WARNING?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	TRUE	1021	32.1	63.5	63.5
	FALSE	181	5.7	11.3	74.8
	DON'T KNOW/NOT SURE	405	12.7	25.2	100.0
	Total	1608	50.6	100.0	
Missing	System	1572	49.4		
Total		3180	100.0		

Q30C TRUE OR FALSE. - VISION LOSS CAUSED BY DIABETES CAN BE PREVENTED?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	TRUE	1104	34.7	68.7	68.7
	FALSE	174	5.5	10.8	79.5
	DON'T KNOW/NOT SURE	330	10.4	20.5	100.0
	Total	1608	50.6	100.0	
Missing	System	1572	49.4		
Total		3180	100.0		

Q30D TRUE OR FALSE. - PEOPLE WITH DIABETES SHOULD HAVE A DILATED EYE EXAM AT LEAST ONCE A YEAR?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	TRUE	1368	43.0	85.1	85.1
	FALSE	16	.5	1.0	86.1
	DON'T KNOW/NOT SURE	224	7.0	13.9	100.0
	Total	1608	50.6	100.0	
Missing	System	1572	49.4		
Total		3180	100.0		

Q30E TRUE OR FALSE. - EYE DISEASE CAUSED BY DIABETES CANNOT BE TREATED?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	TRUE	269	8.4	16.8	16.8
	FALSE	945	29.7	58.9	75.7
	DON'T KNOW/NOT SURE	390	12.3	24.3	100.0
	Total	1603	50.4	100.0	
Missing	REFUSED	4	.1		
	System	1572	49.4		
Total	Total	1577	49.6		
Total		3180	100.0		

Q31 HAVE YOU EVER HEARD THE TERM LOW VISION?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	501	15.7	15.8	15.8
	NO	2638	82.9	83.1	98.8
	DON'T KNOW / NOT SURE	37	1.2	1.2	100.0
	Total	3175	99.8	100.0	
Missing	REFUSED	5	.2		
Total		3180	100.0		

Q32 HAVE YOU EVER BEEN TOLD BY AN EYE CARE PROVIDER THAT YOU HAVE LOW VISION?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	74	2.3	2.3	2.3
	NO	3082	96.9	97.7	100.0
	Total	3155	99.2	100.0	
Missing	DON'T KNOW / NOT SURE	19	.6		
	REFUSED	5	.2		
	Total	25	.8		
Total		3180	100.0		

Q33 DID YOUR EYE CARE PROVIDER EVER RECOMMEND THAT YOU SEE A LOW VISION SPECIALIST?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	23	.7	30.9	30.9
	NO	51	1.6	69.1	100.0
	Total	73	2.3	100.0	
Missing	DON'T KNOW / NOT SURE	0	.0		
	System	3106	97.7		
	Total	3107	97.7		
Total		3180	100.0		

Q34 HAVE YOU SEEN A LOW VISION SPECIALIST?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	19	.6	88.2	88.2
	NO	3	.1	11.8	100.0
	Total	21	.7	100.0	
Missing	DON'T KNOW / NOT SURE	1	.0		
	System	3157	99.3		
	Total	3159	99.3		
Total		3180	100.0		

Q35 WHAT WAS THE MAIN REASON YOU DID NOT SEE A LOW VISION SPECIALIST?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	I DON'T LIKE DOCTORS AND AVOID THEM	1	.0	55.4	55.4
	OTHER (SPECIFY)	0	.0	.0	55.4
	DON'T KNOW / NOT SURE	1	.0	44.6	100.0
	Total	3	.1	100.0	
Missing	System	3177	99.9		
Total		3180	100.0		

Q36 DO YOU CURRENTLY USE ANY TYPE OF VISUAL DEVICE(S) FOR LOW VISION SUCH AS A MAGNIFIER OR TELESCOPE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	304	9.6	9.6	9.6
	NO	2866	90.1	90.4	100.0
	Total	3171	99.7	100.0	
Missing	DON'T KNOW / NOT SURE	4	.1		
	REFUSED	5	.2		
	Total	9	.3		
Total		3180	100.0		

Q37 DID YOU GET INSTRUCTION ON HOW TO USE (THIS/THESE) DEVICE(S)?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	50	1.6	16.6	16.6
	NO	252	7.9	83.4	100.0
	Total	302	9.5	100.0	
Missing	DON'T KNOW / NOT SURE	2	.1		
	System	2876	90.4		
	Total	2878	90.5		
Total		3180	100.0		

Q38 HOW IMPORTANT WOULD YOU SAY THE DEVICE(S) IS/ARE IN YOUR DAY-TO-DAY ACTIVITIES?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	VERY IMPORTANT	88	2.8	28.9	28.9
	SOMEWHAT IMPORTANT	79	2.5	26.0	54.9
	NOT TOO IMPORTANT	103	3.2	33.8	88.7
	NOT IMPORTANT AT ALL	35	1.1	11.3	100.0
	Total	304	9.6	100.0	
Missing	DON'T KNOW / NOT SURE	0	.0		
	System	2876	90.4		
	Total	2876	90.4		
Total		3180	100.0		

Q39A DID YOU USE LARGE PRINT MATERIALS BECAUSE OF PROBLEMS WITH YOUR VISION?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	217	6.8	6.9	6.9
	NO	2946	92.7	93.1	100.0
	Total	3163	99.5	100.0	
Missing	DON'T KNOW / NOT SURE	12	.4		
	REFUSED	5	.2		
	Total	17	.5		
Total		3180	100.0		

Q39B DID YOU USE TALKING BOOKS BECAUSE OF PROBLEMS WITH YOUR VISION?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	39	1.2	1.2	1.2
	NO	3132	98.5	98.8	100.0
	Total	3172	99.7	100.0	
Missing	DON'T KNOW / NOT SURE	3	.1		
	REFUSED	5	.2		
	Total	8	.3		
Total		3180	100.0		

Q39C DID YOU USE OTHER TALKING ITEMS (SUCH AS CLOCKS, WATCHES, CALCULATORS) BECAUSE OF PROBLEMS WITH YOUR VISION?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	70	2.2	2.2	2.2
	NO	3100	97.5	97.8	100.0
	Total	3171	99.7	100.0	
Missing	DON'T KNOW / NOT SURE	4	.1		
	REFUSED	5	.2		
	Total	9	.3		
Total		3180	100.0		

Q39D DID YOU USE A WHITE CANE [THAT VISUALLY IMPAIRED AND BLIND PEOPLE OFTEN USE] BECAUSE OF PROBLEMS WITH YOUR VISION?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	24	.8	.8	.8
	NO	3147	99.0	99.2	100.0
	Total	3172	99.7	100.0	
Missing	DON'T KNOW / NOT SURE	3	.1		
	REFUSED	5	.2		
	Total	8	.3		
Total		3180	100.0		

Q39E DID YOU USE A COMPUTER ADAPTED WITH LARGE PRINT SCREEN OR VOICE OUT-PUT BECAUSE OF PROBLEMS WITH YOUR VISION?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	73	2.3	2.3	2.3
	NO	3094	97.3	97.7	100.0
	Total	3167	99.6	100.0	
Missing	DON'T KNOW / NOT SURE	7	.2		
	REFUSED	5	.2		
	Total	13	.4		
Total		3180	100.0		

Q39F DID YOU USE A GUIDE DOG? BECAUSE OF PROBLEMS WITH YOUR VISION?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	7	.2	.2	.2
	NO	3163	99.5	99.8	100.0
	Total	3170	99.7	100.0	
Missing	DON'T KNOW / NOT SURE	2	.1		
	REFUSED	8	.2		
	Total	10	.3		
Total		3180	100.0		

Q39G DID YOU USE ANY OTHER ASSISTIVE DEVICES BECAUSE OF PROBLEMS WITH YOUR VISION?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	114	3.6	3.6	3.6
	NO	3055	96.1	96.4	100.0
	Total	3169	99.7	100.0	
Missing	DON'T KNOW / NOT SURE	5	.2		
	REFUSED	5	.2		
	Total	11	.3		
Total		3180	100.0		

Q40 OVERALL, HOW IMPORTANT WOULD YOU SAY THE DEVICE(S) ARE IN YOUR DAY-TO-DAY ACTIVITIES?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	VERY IMPORTANT	211	6.6	54.3	54.3
	SOMEWHAT IMPORTANT	78	2.5	20.1	74.4
	NOT TOO IMPORTANT	71	2.2	18.3	92.7
	NOT IMPORTANT AT ALL	28	.9	7.3	100.0
	Total	389	12.2	100.0	
Missing	DON'T KNOW / NOT SURE	2	.1		
	REFUSED	2	.1		
	System Total	2787	87.7		
Total		2791	87.8		
Total		3180	100.0		

Section 5: Information Sources

Q41_A 1st REPONSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	MAGAZINES OR NEWSLETTERS	348	11.0	11.0	11.0
	DAILY OR WEEKLY NEWSPAPERS	72	2.3	2.3	13.3
	EDUCATIONAL PAMPHLETS OR BROCHURES	61	1.9	1.9	15.2
	DRUGSTORE OR SUPERMARKET	10	.3	.3	15.5
	TELEVISION PROGRAMS OR COMMERCIALS	745	23.4	23.5	39.0
	RADIO PROGRAMS OR COMMERCIALS	78	2.4	2.5	41.5
	RELIGIOUS OR SOCIAL ORGANIZATION YOU .	4	.1	.1	41.6
	ONLINE - ON THE INTERNET OR WWW	32	1.0	1.0	42.6
	AT A DOCTOR'S OFFICE, A CLINIC	528	16.6	16.7	59.3
	AT YOUR OFFICE OR WORKPLACE	95	3.0	3.0	62.3
	FROM RELATIVES OR FRIENDS	125	3.9	4.0	66.3
	FROM A HEALTH INFORMATION HOTLINE	14	.4	.4	66.7
	OTHER (SPECIFY)	153	4.8	4.8	71.5
	HAVEN'T SEEN/HEARD ANYTHING ABOUT EYE HEALTH.	654	20.6	20.7	92.2
	DON'T KNOW / NOT SURE	247	7.8	7.8	100.0
	Total	3166	99.6	100.0	
Missing	REFUSED	14	.4		
Total		3180	100.0		

Q41_B 2nd REPOSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	MAGAZINES OR NEWSLETTERS	158	5.0	22.7	22.7
	DAILY OR WEEKLY NEWSPAPERS	102	3.2	14.6	37.2
	EDUCATIONAL PAMPHLETS OR BROCHURES	19	.6	2.7	39.9
	DRUGSTORE OR SUPERMARKET	21	.7	3.1	43.0
	TELEVISION PROGRAMS OR COMMERCIALS	142	4.5	20.4	63.3
	RADIO PROGRAMS OR COMMERCIALS	48	1.5	6.9	70.2
	RELIGIOUS OR SOCIAL ORGANIZATION YOU .	0	.0	.0	70.3
	ONLINE - ON THE INTERNET OR WWW	44	1.4	6.3	76.6
	AT A DOCTOR'S OFFICE, A CLINIC	78	2.5	11.2	87.8
	AT YOUR OFFICE OR WORKPLACE	17	.5	2.4	90.2
	FROM RELATIVES OR FRIENDS	30	.9	4.2	94.5
	FROM A HEALTH INFORMATION HOTLINE	8	.3	1.2	95.6
	OTHER (SPECIFY)	30	1.0	4.4	100.0
	Total	697	21.9	100.0	
Missing	System	2483	78.1		
Total		3180	100.0		

Q41_C 3rd REPOSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	MAGAZINES OR NEWSLETTERS	32	1.0	13.1	13.1
	DAILY OR WEEKLY NEWSPAPERS	28	.9	11.5	24.6
	EDUCATIONAL PAMPHLETS OR BROCHURES	22	.7	9.1	33.7
	DRUGSTORE OR SUPERMARKET	8	.3	3.3	37.0
	TELEVISION PROGRAMS OR COMMERCIALS	45	1.4	18.3	55.3
	RADIO PROGRAMS OR COMMERCIALS	17	.5	6.9	62.2
	ONLINE - ON THE INTERNET OR WWW	15	.5	6.0	68.2
	AT A DOCTOR'S OFFICE, A CLINIC	49	1.5	20.2	88.4
	AT YOUR OFFICE OR WORKPLACE	2	.1	.8	89.1
	FROM RELATIVES OR FRIENDS	13	.4	5.2	94.4
	OTHER (SPECIFY)	14	.4	5.6	100.0
	Total	244	7.7	100.0	
Missing	System	2936	92.3		
Total		3180	100.0		

Q41_D 4th REPOSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	MAGAZINES OR NEWSLETTERS	11	.3	14.1	14.1
	DAILY OR WEEKLY NEWSPAPERS	3	.1	4.2	18.4
	EDUCATIONAL PAMPHLETS OR BROCHURES	5	.2	6.5	24.9
	DRUGSTORE OR SUPERMARKET	11	.3	13.8	38.6
	TELEVISION PROGRAMS OR COMMERCIALS	10	.3	12.6	51.3
	RADIO PROGRAMS OR COMMERCIALS	10	.3	13.0	64.2
	RELIGIOUS OR SOCIAL ORGANIZATION YOU .	2	.1	2.9	67.1
	ONLINE - ON THE INTERNET OR WWW	1	.0	1.1	68.2
	AT A DOCTOR'S OFFICE, A CLINIC	8	.2	10.4	78.6
	AT YOUR OFFICE OR WORKPLACE	9	.3	12.0	90.6
	FROM RELATIVES OR FRIENDS	5	.2	7.0	97.6
	OTHER (SPECIFY)	2	.1	2.4	100.0
	Total	76	2.4	100.0	
Missing	System	3104	97.6		
Total		3180	100.0		

Q41_E 5th REPOSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	DAILY OR WEEKLY NEWSPAPERS	1	.0	5.0	5.0
	EDUCATIONAL PAMPHLETS OR BROCHURES	1	.0	4.9	9.9
	DRUGSTORE OR SUPERMARKET	1	.0	3.3	13.2
	TELEVISION PROGRAMS OR COMMERCIALS	10	.3	34.8	48.0
	RADIO PROGRAMS OR COMMERCIALS	3	.1	10.5	58.5
	ONLINE - ON THE INTERNET OR WWW	1	.0	4.2	62.8
	AT A DOCTOR'S OFFICE, A CLINIC	9	.3	30.1	92.9
	FROM RELATIVES OR FRIENDS	2	.1	7.1	100.0
	Total	28	.9	100.0	
Missing	System	3152	99.1		
Total		3180	100.0		

Q41_F 6th REPOSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	DRUGSTORE OR SUPERMARKET	1	.0	7.5	7.5
	TELEVISION PROGRAMS OR COMMERCIALS	1	.0	5.7	13.2
	RADIO PROGRAMS OR COMMERCIALS	5	.2	32.8	46.0
	ONLINE - ON THE INTERNET OR WWW	4	.1	25.5	71.4
	AT A DOCTOR'S OFFICE, A CLINIC	3	.1	15.1	86.6
	FROM A HEALTH INFORMATION HOTLINE	1	.0	4.9	91.4
	OTHER (SPECIFY)	1	.0	8.6	100.0
	Total	17	.5	100.0	
Missing	System	3163	99.5		
Total		3180	100.0		

Q41_G 7th REPOSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	RADIO PROGRAMS OR COMMERCIALS	1	.0	7.6	7.6
	RELIGIOUS OR SOCIAL ORGANIZATION YOU .	0	.0	3.2	10.8
	ONLINE - ON THE INTERNET OR WWW	4	.1	33.3	44.1
	AT A DOCTOR'S OFFICE, A CLINIC	6	.2	51.4	95.5
	FROM RELATIVES OR FRIENDS	1	.0	4.5	100.0
	FROM A HEALTH INFORMATION HOTLINE	0	.0	.0	100.0
	Total	12	.4	100.0	
Missing	System	3168	99.6		
Total		3180	100.0		

Q41_H 8th REPOSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	RELIGIOUS OR SOCIAL ORGANIZATION YOU .	1	.0	8.3	8.3
	AT A DOCTOR'S OFFICE, A CLINIC	5	.1	39.8	48.0
	AT YOUR OFFICE OR WORKPLACE	2	.1	18.7	66.7
	FROM RELATIVES OR FRIENDS	2	.1	17.3	84.0
	FROM A HEALTH INFORMATION HOTLINE	2	.1	16.0	100.0
	Total	11	.4	100.0	
Missing	System	3169	99.6		
Total		3180	100.0		

Q41_I 9th REPOSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	RELIGIOUS OR SOCIAL ORGANIZATION YOU .	1	.0	24.5	24.5
	AT YOUR OFFICE OR WORKPLACE	3	.1	56.9	81.5
	FROM RELATIVES OR FRIENDS	1	.0	18.5	100.0
	Total	5	.2	100.0	
Missing	System	3175	99.8		
Total		3180	100.0		

Q41_J 10th REPOSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	FROM RELATIVES OR FRIENDS	3	.1	100.0	100.0
Missing	System	3177	99.9		
Total		3180	100.0		

Q41_K 11th REPOSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	FROM A HEALTH INFORMATION HOTLINE	0	.0	100.0	100.0
Missing	System	3180	100.0		
Total		3180	100.0		

Q42A IN THE PAST 12 MONTHS, HAVE YOU TALKED ABOUT EYE HEALTH OR EYE DISEASE WITH A HEALTH CARE PROVIDER WHO IS NOT AN EY

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	489	15.4	15.5	15.5
	NO	2673	84.1	84.5	100.0
	Total	3162	99.4	100.0	
Missing	DON'T KNOW/NOT SURE	11	.4		
	REFUSED	7	.2		
	Total	18	.6		
Total		3180	100.0		

Q42B IN THE PAST 12 MONTHS, HAVE YOU TALKED ABOUT EYE HEALTH OR EYE DISEASE WITH A PHARMACIST?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	73	2.3	2.3	2.3
	NO	3100	97.5	97.7	100.0
	Total	3173	99.8	100.0	
Missing	DON'T KNOW/NOT SURE	0	.0		
	REFUSED	6	.2		
	Total	7	.2		
Total		3180	100.0		

Q42C IN THE PAST 12 MONTHS, HAVE YOU TALKED ABOUT EYE HEALTH OR EYE DISEASE WITH A RELATIVE OR FRIEND?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	1338	42.1	42.3	42.3
	NO	1826	57.4	57.7	100.0
	Total	3164	99.5	100.0	
Missing	DON'T KNOW/NOT SURE	10	.3		
	REFUSED	6	.2		
	Total	16	.5		
Total		3180	100.0		

Q42D IN THE PAST 12 MONTHS, HAVE YOU TALKED ABOUT EYE HEALTH OR EYE DISEASE WITH AN EYE CARE PROVIDER (EYE DOCTOR)?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	1308	41.1	41.3	41.3
	NO	1862	58.5	58.7	100.0
	Total	3170	99.7	100.0	
Missing	DON'T KNOW/NOT SURE	3	.1		
	REFUSED	7	.2		
	Total	10	.3		
Total		3180	100.0		

Q42E IN THE PAST 12 MONTHS, HAVE YOU TALKED ABOUT EYE HEALTH OR EYE DISEASE WITH CO-WORKERS/EMPLOYER?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	474	14.9	15.0	15.0
	NO	2693	84.7	85.0	100.0
	Total	3167	99.6	100.0	
Missing	DON'T KNOW/NOT SURE	5	.2		
	REFUSED	8	.3		
	Total	13	.4		
Total		3180	100.0		

Q42F IN THE PAST YEAR, HAVE YOU TALKED ABOUT EYE HEALTH OR EYE DISEASE WITH ANYONE ELSE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	98	3.1	3.1	3.1
	NO	3061	96.3	96.9	100.0
	Total	3159	99.3	100.0	
Missing	DON'T KNOW/NOT SURE	13	.4		
	REFUSED	8	.2		
	Total	21	.7		
Total		3180	100.0		

Section 6: Insurance

Q43 DO YOU HAVE ANY KIND OF HEALTH CARE COVERAGE, INCLUDING HEALTH INSURANCE, PREPAID PLANS SUCH AS HMOS, OR GOVERNMENT

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	2514	79.1	79.5	79.5
	NO	624	19.6	19.7	99.2
	DON'T KNOW/NOT SURE	25	.8	.8	100.0
	Total	3163	99.5	100.0	
Missing	REFUSED	17	.5		
Total		3180	100.0		

Q44_A 1st RESPONSE - WHAT TYPE OF HEALTH CARE COVERAGE DO YOU HAVE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	MEDICARE	587	18.5	23.5	23.5
	MEDICAID	137	4.3	5.5	29.0
	MILITARY HEALTH	70	2.2	2.8	31.8
	PRIVATE INSURANCE	1611	50.7	64.5	96.3
	OTHER (SPECIFY)	49	1.5	2.0	98.3
	DON'T KNOW / NOT SURE	43	1.3	1.7	100.0
	Total	2497	78.5	100.0	
Missing	REFUSED	17	.5		
	System	666	20.9		
Total	Total	683	21.5		
Total		3180	100.0		

Q44_B 2nd RESPONSE - WHAT TYPE OF HEALTH CARE COVERAGE DO YOU HAVE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	MEDICARE	23	.7	8.4	8.4
	MEDICAID	42	1.3	15.6	24.1
	MILITARY HEALTH	28	.9	10.4	34.5
	PRIVATE INSURANCE	164	5.1	60.9	95.4
	OTHER (SPECIFY)	9	.3	3.3	98.6
	DON'T KNOW / NOT SURE	4	.1	1.4	100.0
	Total	269	8.5	100.0	
Missing	System	2911	91.5		
Total		3180	100.0		

Q44_C 3rd RESPONSE - WHAT TYPE OF HEALTH CARE COVERAGE DO YOU HAVE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	MEDICAID	1	.0	6.7	6.7
	MILITARY HEALTH	6	.2	52.8	59.5
	PRIVATE INSURANCE	4	.1	31.4	90.9
	OTHER (SPECIFY)	1	.0	9.1	100.0
	Total	12	.4	100.0	
Missing	System	3168	99.6		
Total		3180	100.0		

Q45 HOW MUCH OF THE COST OF A REGULAR EYE EXAM PROVIDED BY AN EYE CARE PROVIDER IS COVERED BY YOUR HEALTH CARE COVERAGE

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	ALL	732	23.0	29.2	29.2
	PART	950	29.9	38.0	67.2
	NONE	421	13.2	16.8	84.0
	DON'T KNOW / NOT SURE	401	12.6	16.0	100.0
	Total	2503	78.7	100.0	
Missing	REFUSED	11	.3		
	System	666	20.9		
	Total	677	21.3		
Total		3180	100.0		

Q46 DOES YOUR HEALTH CARE COVERAGE AND/OR VISION INSURANCE PAY FOR ANY PART OF THE COST OF GLASSES OR CONTACT LENSES?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	1291	40.6	51.5	51.5
	NO	943	29.6	37.6	89.0
	DON'T KNOW/NOT SURE	275	8.7	11.0	100.0
	Total	2509	78.9	100.0	
Missing	REFUSED	5	.2		
	System	666	20.9		
	Total	671	21.1		
Total		3180	100.0		

Q47 DOES YOUR HEALTH CARE COVERAGE AND/OR VISION INSURANCE PAY FOR ANY PART OF VISUAL DEVICES THAT ARE PRESCRIBED BY AN

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	371	11.7	14.8	14.8
	NO	1008	31.7	40.2	54.9
	DON'T KNOW/NOT SURE	1131	35.6	45.1	100.0
	Total	2509	78.9	100.0	
Missing	REFUSED	5	.2		
	System	666	20.9		
	Total	671	21.1		
Total		3180	100.0		

Section 7: Demographics

Q48 WHAT IS THE LAST GRADE IN SCHOOL YOU COMPLETED?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	SOME HIGH SCHOOL	596	18.7	19.0	19.0
	HIGH SCHOOL DIPLOMA OR EQUIVALENT	916	28.8	29.2	48.2
	SOME COLLEGE	900	28.3	28.7	76.9
	FOUR YEAR COLLEGE DEGREE COMPLETED	423	13.3	13.5	90.4
	GRADUATE SCHOOL STARTED OR COMPLETED	301	9.5	9.6	100.0
	Total	3135	98.6	100.0	
Missing	DON'T KNOW/NOT SURE	16	.5		
	REFUSED	29	.9		
	Total	45	1.4		
Total		3180	100.0		

Q49 WHAT IS YOUR CURRENT MARITAL STATUS?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	MARRIED	1893	59.5	60.1	60.1
	DIVORCED OR SEPARATED	362	11.4	11.5	71.6
	WIDOWED, OR	204	6.4	6.5	78.1
	SINGLE (NEVER MARRIED)	691	21.7	21.9	100.0
	Total	3150	99.1	100.0	
Missing	DON'T KNOW/NOT SURE	1	.0		
	REFUSED \LSP	28	.9		
	Total	30	.9		
Total		3180	100.0		

Q50 HOW MANY ADULTS AND CHILDREN PRESENTLY LIVE IN YOUR HOUSEHOLD, COUNTING YOURSELF?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1	472	14.8	15.0	15.0
	2	1027	32.3	32.7	47.7
	3	558	17.5	17.7	65.5
	4	609	19.1	19.4	84.8
	5	285	9.0	9.1	93.9
	6	116	3.7	3.7	97.6
	7	44	1.4	1.4	99.0
	8	13	.4	.4	99.4
	9	5	.2	.2	99.6
	10	7	.2	.2	99.8
	11	0	.0	.0	99.8
	12	4	.1	.1	100.0
	15	1	.0	.0	100.0
	Total	3142	98.8	100.0	
	Missing	77	3	.1	
99		35	1.1		
Total		38	1.2		
Total		3180	100.0		

Q51A MAY I HAVE YOUR AGE AS OF YOUR LAST BIRTHDAY?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	18	90	2.8	2.9	2.9
	19	52	1.6	1.7	4.6
	20	43	1.4	1.4	6.0
	21	34	1.1	1.1	7.1
	22	61	1.9	2.0	9.1
	23	36	1.1	1.2	10.3
	24	52	1.6	1.7	11.9
	25	62	2.0	2.0	13.9
	26	34	1.1	1.1	15.0
	27	50	1.6	1.6	16.6
	28	62	1.9	2.0	18.6
	29	50	1.6	1.6	20.3
	30	67	2.1	2.2	22.4
	31	60	1.9	1.9	24.4
	32	68	2.1	2.2	26.6
	33	78	2.4	2.5	29.1
	34	67	2.1	2.2	31.2
	35	72	2.3	2.3	33.6
	36	54	1.7	1.7	35.3
	37	52	1.6	1.7	37.0
	38	60	1.9	1.9	38.9
	39	64	2.0	2.1	41.0
	40	76	2.4	2.4	43.5
	41	87	2.7	2.8	46.3
	42	71	2.2	2.3	48.6
	43	65	2.0	2.1	50.7
	44	62	1.9	2.0	52.7
	45	77	2.4	2.5	55.2

Q51A MAY I HAVE YOUR AGE AS OF YOUR LAST BIRTHDAY?

	Frequency	Percent	Valid Percent	Cumulative Percent
Valid 46	60	1.9	1.9	57.1
47	56	1.8	1.8	58.9
48	47	1.5	1.5	60.4
49	51	1.6	1.6	62.1
50	62	2.0	2.0	64.1
51	48	1.5	1.6	65.7
52	64	2.0	2.1	67.8
53	50	1.6	1.6	69.4
54	56	1.7	1.8	71.2
55	42	1.3	1.4	72.5
56	33	1.0	1.1	73.6
57	47	1.5	1.5	75.1
58	38	1.2	1.2	76.4
59	26	.8	.8	77.2
60	46	1.4	1.5	78.7
61	44	1.4	1.4	80.1
62	24	.8	.8	80.9
63	37	1.2	1.2	82.1
64	27	.9	.9	82.9
65	42	1.3	1.4	84.3
66	29	.9	.9	85.3
67	39	1.2	1.2	86.5
68	27	.9	.9	87.4
69	46	1.4	1.5	88.9
70	29	.9	.9	89.8
71	26	.8	.9	90.6
72	22	.7	.7	91.3
73	24	.7	.8	92.1
74	18	.6	.6	92.7
75	36	1.1	1.2	93.8
76	9	.3	.3	94.1
77	28	.9	.9	95.0
78	18	.6	.6	95.6
79	16	.5	.5	96.1
80	14	.4	.4	96.5
81	19	.6	.6	97.2
82	10	.3	.3	97.5
83	12	.4	.4	97.9
84	18	.6	.6	98.4
85	13	.4	.4	98.9
86	7	.2	.2	99.1
87	6	.2	.2	99.3
88	6	.2	.2	99.4
89	1	.0	.0	99.5
90	5	.1	.1	99.6
91	2	.1	.1	99.7
92	1	.0	.0	99.7
96	0	.0	.0	99.7
97	0	.0	.0	99.7
99	9	.3	.3	100.0
Total	3095	97.3	100.0	

Q51A MAY I HAVE YOUR AGE AS OF YOUR LAST BIRTHDAY?

	Frequency	Percent	Valid Percent	Cumulative Percent
Missing	7	.3		
	9	2.4		
Total	85	2.7		
Total	3180	100.0		

Q51B WHICH ONE OF THE FOLLOWING CATEGORIES BEST REPRESENTS YOUR AGE AS OF YOUR LAST BIRTHDAY?

	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	UNDER 25	1	.0	1.7
	25-34	5	.1	12.4
	35-44	7	.2	16.7
	45-54	8	.2	17.8
	55-64	8	.3	18.4
	65-74	12	.4	27.7
	75 YEARS AND OLDER	3	.1	7.0
	Total	44	1.4	100.0
Missing	REFUSED	41	1.3	
	System	3095	97.3	
	Total	3136	98.6	
Total		3180	100.0	

Q52 ARE YOU OF HISPANIC ORIGIN OR DESCENT?

	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	YES	342	10.8	11.0
	NO	2777	87.3	89.0
	Total	3119	98.1	100.0
Missing	DON'T KNOW/NOT SURE	24	.8	
	REFUSED	37	1.2	
	Total	61	1.9	
Total		3180	100.0	

Q53_A 1st RESPONSE - WHICH ONE OR MORE OF THE FOLLOWING BEST DESCRIBES YOUR RACE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	AMERICAN INDIAN AND ALASKA NATIVE.	57	1.8	1.8	1.8
	ASIAN	116	3.7	3.7	5.6
	NATIVE HAWAIIAN AND OTHER PACIFIC ISLANDER.	8	.2	.3	5.8
	BLACK OR AFRICAN AMERICAN	340	10.7	10.9	16.8
	CAUCASIAN	2353	74.0	75.7	92.5
	OTHER: (SPECIFY).	234	7.4	7.5	100.0
	Total	3109	97.8	100.0	
Missing	DON'T KNOW/NOT SURE	19	.6		
	REFUSED.	52	1.6		
	Total	71	2.2		
Total		3180	100.0		

Q53_B 2nd RESPONSE - WHICH ONE OR MORE OF THE FOLLOWING BEST DESCRIBES YOUR RACE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	AMERICAN INDIAN AND ALASKA NATIVE.	4	.1	19.2	19.2
	ASIAN	2	.1	11.4	30.6
	NATIVE HAWAIIAN AND OTHER PACIFIC ISLANDER.	0	.0	.0	30.7
	BLACK OR AFRICAN AMERICAN	2	.1	8.3	39.0
	CAUCASIAN	11	.3	50.1	89.1
	OTHER: (SPECIFY).	2	.1	10.9	100.0
	Total	21	.7	100.0	
Missing	System	3159	99.3		
Total		3180	100.0		

Q53_C 3rd RESPONSE - WHICH ONE OR MORE OF THE FOLLOWING BEST DESCRIBES YOUR RACE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	ASIAN	0	.0	.1	.1
	NATIVE HAWAIIAN AND OTHER PACIFIC ISLANDER.	1	.0	99.4	99.4
	CAUCASIAN	0	.0	.6	100.0
	Total	1	.0	100.0	
Missing	System	3179	100.0		
Total		3180	100.0		

Q53_D 4th RESPONSE - WHICH ONE OR MORE OF THE FOLLOWING BEST DESCRIBES YOUR RACE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	BLACK OR AFRICAN AMERICAN	1	.0	100.0	100.0
Missing	System	3179	100.0		
Total		3180	100.0		

Q53_E 5th RESPONSE - WHICH ONE OR MORE OF THE FOLLOWING BEST DESCRIBES YOUR RACE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	CAUCASIAN	1	.0	100.0	100.0
Missing	System	3179	100.0		
Total		3180	100.0		

Q53_F 6th RESPONSE - WHICH ONE OR MORE OF THE FOLLOWING BEST DESCRIBES YOUR RACE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	OTHER: (SPECIFY).	1	.0	100.0	100.0
Missing	System	3179	100.0		
Total		3180	100.0		

Q54 WHICH DESCRIBES YOUR TOTAL HOUSEHOLD INCOME BEFORE TAXES IN 2004?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	LESS THAN \$10,000	272	8.6	10.1	10.1
	\$10,000 TO \$14,999	224	7.0	8.4	18.5
	\$15,000 TO \$24,999	314	9.9	11.7	30.2
	\$25,000 TO \$34,999	346	10.9	12.9	43.1
	\$35,000 TO \$49,999	375	11.8	14.0	57.0
	\$50,000 TO \$74,999	501	15.7	18.7	75.7
	\$75,000 TO \$99,999	325	10.2	12.1	87.8
	\$100,000 TO \$149,999	223	7.0	8.3	96.1
	\$150,000 TO \$199,999	53	1.7	2.0	98.1
	\$200,000 OR MORE	52	1.6	1.9	100.0
	Total	2684	84.4	100.0	
Missing	DON'T KNOW/NOT SURE	150	4.7		
	REFUSED	345	10.9		
	Total	496	15.6		
Total		3180	100.0		

Q55 PLEASE TELL ME YOUR GENDER.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	MALE	1510	47.5	47.8	47.8
	FEMALE	1652	51.9	52.2	100.0
	Total	3162	99.4	100.0	
Missing	REFUSED	18	.6		
Total		3180	100.0		

AGE GROUP

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	18 to 24	370	11.6	11.8	11.8
	25 to 34	602	18.9	19.2	31.0
	35 to 44	671	21.1	21.4	52.4
	45 to 54	580	18.2	18.5	70.8
	55 to 64	372	11.7	11.9	82.7
	65 plus	543	17.1	17.3	100.0
	Total	3139	98.7	100.0	
Missing	System	41	1.3		
Total		3180	100.0		

WEIGHTING GEOGRAPHIC REGION

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	NORTHEAST	609	19.2	19.2	19.2
	NORTH CENTRAL	729	22.9	22.9	42.1
	SOUTH	1121	35.2	35.2	77.3
	WEST	721	22.7	22.7	100.0
	Total	3180	100.0	100.0	

WEIGHTING EDUCATION

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	SOME HIGH SCHOOL	596	18.7	19.0	19.0
	HIGH SCHOOL GRAD	916	28.8	29.2	48.2
	SOME COLLEGE	900	28.3	28.7	76.9
	COLLEGE GRAD	724	22.8	23.1	100.0
	Total	3135	98.6	100.0	
Missing	System	45	1.4		
Total		3180	100.0		

WEIGHTING RACE

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	HISPANIC	342	10.8	11.0	11.0
	WHITE	2269	71.4	72.7	83.6
	BLACK	326	10.3	10.4	94.1
	ASIAN	114	3.6	3.6	97.7
	PACIFIC ISLANDER	4	.1	.1	97.8
	OTHER RACE	67	2.1	2.2	100.0
	Total	3123	98.2	100.0	
Missing	System	57	1.8		
Total		3180	100.0		

Istate

	Frequency	Percent	Valid Percent	Cumulative Percent
Valid AK	15	.5	.5	.5
AL	78	2.5	2.5	2.9
AR	38	1.2	1.2	4.1
AZ	61	1.9	1.9	6.1
CA	319	10.0	10.0	16.1
CO	60	1.9	1.9	18.0
CT	22	.7	.7	18.6
DC	1	.0	.0	18.7
DE	3	.1	.1	18.8
FL	146	4.6	4.6	23.4
GA	73	2.3	2.3	25.7
HI	54	1.7	1.7	27.4
IA	52	1.6	1.6	29.0
ID	24	.7	.7	29.8
IL	93	2.9	2.9	32.7
IN	75	2.4	2.4	35.1
KS	29	.9	.9	36.0
KY	61	1.9	1.9	37.9
LA	52	1.6	1.6	39.5
MA	76	2.4	2.4	41.9
MD	60	1.9	1.9	43.8
ME	23	.7	.7	44.5
MI	101	3.2	3.2	47.7
MN	62	1.9	1.9	49.6
MO	73	2.3	2.3	51.9
MS	38	1.2	1.2	53.1
MT	11	.4	.4	53.5
NC	115	3.6	3.6	57.1
ND	8	.2	.2	57.4
NE	23	.7	.7	58.1
NH	16	.5	.5	58.6
NJ	75	2.3	2.3	60.9
NM	26	.8	.8	61.7
NV	15	.5	.5	62.2
NY	180	5.6	5.6	67.8
OH	120	3.8	3.8	71.6
OK	46	1.5	1.5	73.1
OR	45	1.4	1.4	74.5
PA	195	6.1	6.1	80.6
RI	8	.3	.3	80.9
SC	56	1.8	1.8	82.6
SD	12	.4	.4	83.0
TN	71	2.2	2.2	85.3
TX	176	5.5	5.5	90.8
UT	16	.5	.5	91.3
VA	65	2.1	2.1	93.3
VT	15	.5	.5	93.8
WA	71	2.2	2.2	96.0
WI	82	2.6	2.6	98.6
WV	40	1.3	1.3	99.9
WY	4	.1	.1	100.0
Total	3180	100.0	100.0	

URBAN / SUBURBAN / RURAL

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	RURAL	798	25.1	25.1	25.1
	SUBURBAN	1483	46.6	46.6	71.7
	URBAN	900	28.3	28.3	100.0
	Total	3180	100.0	100.0	

Statistics (Mean, Median, Mode) for Each Variable (KAP 2005 - Weighted Data)

Statistics

		Q1 IN GENERAL, WOULD YOU SAY YOUR HEALTH IS:	Q2 ABOUT HOW LONG AGO WAS THE LAST TIME YOU SAW OR VISITED A HEALTH CARE PROVIDER?	Q3A HAVE YOU EVER BEEN TOLD BY A HEALTH CARE PROVIDER THAT YOU HAVE DIABETES?	Q3B HAVE YOU EVER BEEN TOLD BY A HEALTH CARE PROVIDER THAT YOU HAVE HIGH BLOOD PRESSURE?	Q3C HAVE YOU EVER BEEN TOLD BY A HEALTH CARE PROVIDER THAT YOU HAVE HEART DISEASE?
N	Valid	3174	3165	3175	3174	3165
	Missing	6	15	5	6	15
Mean		2.50	1.80	1.91	1.73	1.93
Median		2.00	2.00	2.00	2.00	2.00
Mode		2	2	2	2	2

Statistics

		Q3D HAVE YOU EVER BEEN TOLD BY A HEALTH CARE PROVIDER THAT YOU HAVE ARTHRITIS?	Q3E HAVE YOU EVER BEEN TOLD BY A HEALTH CARE PROVIDER THAT YOU HAVE CANCER?	Q4A ARE YOU SEEKING OR RECEIVING TREATMENT OR HAVE YOU RECEIVED TREATMENT IN THE PAST FOR DIABETES FROM A HEALTH CARE PR	Q4B ARE YOU SEEKING OR RECEIVING TREATMENT OR HAVE YOU RECEIVED TREATMENT IN THE PAST FOR HIGH BLOOD PRESSURE FROM A HEA	Q4C ARE YOU SEEKING OR RECEIVING TREATMENT OR HAVE YOU RECEIVED TREATMENT IN THE PAST FOR HBHEART DISEASEE FROM A HEALT
N	Valid	3165	3175	300	857	225
	Missing	15	5	2880	2323	2955
Mean		1.79	1.94	1.15	1.18	1.14
Median		2.00	2.00	1.00	1.00	1.00
Mode		2	2	1	1	1

Statistics

		Q4D ARE YOU SEEKING OR RECEIVING TREATMENT OR HAVE YOU RECEIVED TREATMENT IN THE PAST FOR BARTHRITIS\ E FROM A HEALTH CA	Q4E ARE YOU SEEKING OR RECEIVING TREATMENT OR HAVE YOU RECEIVED TREATMENT IN THE PAST FOR \BCANCER\E FROM A HEALTH CARE	Q5A HOW WOULD YOU RATE LOSING YOUR MEMORY?	Q5B HOW WOULD YOU RATE LOSING YOUR HEARING?	Q5C HOW WOULD YOU RATE LOSING YOUR EYESIGHHT?	Q5D HOW WOULD YOU RATE LOSING YOUR SPEECH?
N	Valid	669	200	3135	3145	3146	3146
	Missing	2511	2980	45	35	34	34
Mean		1.38	1.18	8.82	7.81	9.03	7.85
Median		1.00	1.00	10.00	8.00	10.00	9.00
Mode		1	1	10	10	10	10

Statistics

		HOW WOULD YOU RATE LOSING AN ARM OR A LEG?	Q6_A 1st RESPONSE DO YOU WEAR ...?	Q6_B 2nd RESPONSE DO YOU WEAR ...?	Q7 DID AN EYE CARE PROVIDER PRESCRIBE OR RECOMMEND THE GLASSES OR CONTACT LENSES YOU CURRENTLY WEAR?	Q8 AT THE PRESENT TIME, WOULD YOU SAY YOUR EYESIGHT, WITH GLASSES OR CONTACT LENSES WHEN YOU WEAR THEM, IS ...?
N	Valid	3135	3178	20	2101	2098
	Missing	45	2	3160	1079	1082
Mean		7.70	2.99	3.78	1.08	2.20
Median		8.00	3.00	4.00	1.00	2.00
Mode		10	1	4	1	2

Statistics

		Q9 WOULD YOU SAY YOUR EYESIGHT IS ...?	Q10A DO YOU WEAR YOUR GLASSES OR CONTACT LENSES TO SEE THINGS THAT ARE CLOSE UP?	Q10B DO YOU WEAR YOUR GLASSES OR CONTACT LENSES TO SEE THINGS AT AN INTERMEDIATE DISTANCE?	Q10C DO YOU WEAR YOUR GLASSES OR CONTACT LENSES TO SEE THINGS THAT ARE MORE DISTANT?	Q11 HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE AN EYE CONDITION OR DISEASE?
N	Valid	1073	2095	2089	2096	3155
	Missing	2107	1085	1091	1084	25
Mean		2.18	1.25	1.41	1.30	1.78
Median		2.00	1.00	1.00	1.00	2.00
Mode		1	1	1	1	2

Statistics

		Q12A HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE AMBLYOPIA (AMBLEE-O-P-AH)?	Q12B HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE CATARACT?	Q12C HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE DIABETIC RETINOPATHY OR DIABETIC EYE DISEASE?	Q12D HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE GLAUCOMA?	Q12E HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU ARE SUSPECT FOR GLAUCOMA?
N	Valid	3160	3169	3165	3167	3045
	Missing	20	11	15	13	135
Mean		1.91	1.87	1.99	1.97	1.96
Median		2.00	2.00	2.00	2.00	2.00
Mode		2	2	2	2	2

Statistics

		Q12F HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE AGE-RELATED MACULAR DEGENERATION?	Q12G HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE BNEARSIGHT EDNESS?	Q12H HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE FARSIGHTEDNESS?	Q12I HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE ANY OTHER EYE DISEASE OR CONDITION?	Q13A ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR AMBLYOPIA (AMBLEE-O-P-AH)?
N	Valid	3143	3135	3126	3160	277
	Missing	37	45	54	20	2903
Mean		1.96	1.61	1.70	1.95	1.63
Median		2.00	2.00	2.00	2.00	2.00
Mode		2	2	2	2	2

Statistics

		Q13B ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR CATARACT?	Q13C ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR DIABETIC RETINOPATHY?	Q13D ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR GLAUCOMA?	Q13E ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR SUSPECT FOR GLUACOMA?	Q13F ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR AGE-RELATED MACULAR DEGENERATION?
N	Valid	397	41	106	109	112
	Missing	2783	3139	3074	3071	3068
Mean		1.37	1.34	1.21	1.46	1.43
Median		1.00	1.00	1.00	1.00	1.00
Mode		1	1	1	1	1

Statistics

		Q13G ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR NEARSIGHT EDNESS?	Q13H ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR FARSIGHTEDNESS?	Q13I ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR SOME OTHER CONDITION?	Q14 HAVE YOU EVER HAD AN EYE INJURY OR TRAUMA REQUIRING A DOCTOR'S CARE IN THE EMERGENCY ROOM OR AT A DOCTOR'S OFFICE?	Q15_A 1st RESPONSE - FOR THE LAST EYE INJURY OR TRAUMA THAT YOU CAN REMEMBER, HOW DID IT OCCUR?
N	Valid	1203	934	164	3170	580
	Missing	1977	2246	3016	10	2600
Mean		1.28	1.36	1.43	1.81	4.79
Median		1.00	1.00	1.00	2.00	6.00
Mode		1	1	1	2	7

Statistics

		Q16 HAVE YOU EXPERIENCED A PERMANENT CHANGE IN YOUR VISION OR PERMANENT LOSS BECAUSE OF THIS INJURY OR TRAUMA?	Q17 DID YOU HAVE TO STAY IN A HOSPITAL OVERNIGHT OR LONGER BECAUSE OF THIS INJURY OR TRAUMA?	Q18 HAVE YOU EVER HAD YOUR EYES EXAMINED BY A HEALTH CARE PROVIDER?	Q19 WERE YOUR PUPILS DILATED?	Q20 WHEN YOU TYPICALLY HAVE YOUR EYES EXAMINED, WHO EXAMINES THEM?
N	Valid	587	592	3171	2810	2842
	Missing	2593	2588	9	370	338
Mean		1.88	1.90	1.09	1.24	1.16
Median		2.00	2.00	1.00	1.00	1.00
Mode		2	2	1	1	1

Statistics

		Q21 WHEN WAS THE LAST EYE EXAMINATION YOU HAD BY AN EYE CARE PROVIDER SUCH AS AN OPHTHALMOLOGIST OR OPTOMETRIST?	Q22 WHAT WAS THE ONE MAIN REASON YOU HAD YOUR EYES EXAMINED THE LAST TIME BY AN EYE CARE PROVIDER?	Q23 IS THERE A PARTICULAR OR ONE MAIN REASON WHY YOU HAVE NEVER HAD YOUR EYES EXAMINED BY AN EYE CARE PROVIDER?	Q24A IF FAMILY MEMBERS SAID THAT YOU NEEDED TO HAVE YOUR EYES EXAMINED, HOW LIKELY WOULD IT BE THAT YOU WOULD HAVE AN EYE	Q24B IF YOUR PRIMARY CARE PROVIDER SAID THAT YOU NEEDED TO HAVE YOUR EYES EXAMINED, HOW LIKELY WOULD IT BE THAT YOU WOULD
N	Valid	2872	2804	344	3147	3149
	Missing	308	376	2836	33	31
Mean		2.61	2.77	6.16	1.86	1.24
Median		2.00	1.00	1.00	2.00	1.00
Mode		2	1	1	2	1

Statistics

		Q24C IF YOUR PHARMACIST SAID THAT YOU NEEDED TO HAVE YOUR EYES EXAMINED, HOW LIKELY WOULD IT BE THAT YOU WOULD HAVE AN	Q24D IF YOUR FRIENDSE SAID THAT YOU NEEDED TO HAVE YOUR EYES EXAMINED, HOW LIKELY WOULD IT BE THAT YOU WOULD HAVE AN EYE	Q24E IF CO-WORKERS/ EMPLOYER SAID THAT YOU NEEDED TO HAVE YOUR EYES EXAMINED, HOW LIKELY WOULD IT BE THAT YOU WOULD HAVE	Q24F IF RELIGIOUS LEADER SAID THAT YOU NEEDED TO HAVE YOUR EYES EXAMINED, HOW LIKELY WOULD IT BE THAT YOU WOULD HAVE AN	Q25 HAVE YOU EVER HEARD OF GLAUCOMA?
N	Valid	3103	3143	3095	3115	3175
	Missing	77	37	85	65	5
Mean		2.18	2.28	2.05	2.44	1.23
Median		2.00	2.00	2.00	3.00	1.00
Mode		3	3	2	3	1

Statistics

		Q26A TRUE OR FALSE.- GLAUCOMA CAN CAUSE VISION LOSS?	Q26C TRUE OR FALSE.- THERE ARE EARLY WARNING SYMPTOMS FOR GLAUCOMA?	Q26C TRUE OR FALSE - VISION LOSS FROM GLAUCOMA CAN BE PREVENTED?	Q26D TRUE OR FALSE.- GLAUCOMA CAN BE TREATED?	Q27 HAVE YOU EVER HEARD OF AGE-RELATED MACULAR DEGENERATION?
N	Valid	2867	2867	2866	2867	3175
	Missing	313	313	314	313	5
Mean		6.40	20.50	19.74	9.36	2.50
Median		1.00	1.00	1.00	1.00	1.00
Mode		1	1	1	1	1

Statistics

		Q28A TRUE OR FALSE. - VITAMINS AND ZINC CAN HELP PREVENT VISION LOSS FROM AMD IN SOME PEOPLE?	Q28B TRUE OR FALSE. - AMD USUALLY RUNS IN FAMILIES?	Q28C TRUE OR FALSE - A PERSON CAN HAVE AMD AND NOT KNOW IT?	Q28D TRUE OR FALSE. - AMD CAN CAUSE CENTRAL VISION LOSS?	Q29 HAVE YOU EVER HEARD OF DIABETIC EYE DISEASE SUCH AS DIABETIC RETINOPATHY?
N	Valid	1643	1641	1643	1643	3175
	Missing	1537	1539	1537	1537	5
Mean		36.10	36.56	17.42	20.97	2.91
Median		2.00	2.00	1.00	1.00	1.00
Mode		77	77	1	1	1

Statistics

		Q30A TRUE OR FALSE. - PEOPLE WITH DIABETES ARE AT HIGHER RISK FOR EYE DISEASE?	Q30B TRUE OR FALSE. - EYE DISEASE CAUSED BY DIABETES USUALLY HAS EARLY WARNING?	Q30C TRUE OR FALSE. - VISION LOSS CAUSED BY DIABETES CAN BE PREVENTED?	Q30D TRUE OR FALSE. - PEOPLE WITH DIABETES SHOULD HAVE A DILATED EYE EXAM AT LEAST ONCE A YEAR?	Q30E TRUE OR FALSE. - EYE DISEASE CAUSED BY DIABETES CANNOT BE TREATED?
N	Valid	1608	1608	1608	1608	1603
	Missing	1572	1572	1572	1572	1577
Mean		4.79	20.25	16.70	11.58	20.07
Median		1.00	1.00	1.00	1.00	2.00
Mode		1	1	1	1	2

Statistics

		Q31 HAVE YOU EVER HEARD THE TERM LOW VISION?	Q32 HAVE YOU EVER BEEN TOLD BY AN EYE CARE PROVIDER THAT YOU HAVE LOW VISION?	Q33 DID YOUR EYE CARE PROVIDER EVER RECOMMEND THAT YOU SEE A LOW VISION SPECIALIST?	Q34 HAVE YOU SEEN A LOW VISION SPECIALIST?	Q35 WHAT WAS THE MAIN REASON YOU DID NOT SEE A LOW VISION SPECIALIST?
N	Valid	3175	3155	73	21	3
	Missing	5	25	3107	3159	3177
Mean		2.71	1.98	1.69	1.12	36.54
Median		2.00	2.00	2.00	1.00	36.17
Mode		2	2	2	1	4

Statistics

		Q36 DO YOU CURRENTLY USE ANY TYPE OF VISUAL DEVICE(S) FOR LOW VISION SUCH AS A MAGNIFIER OR TELESCOPE?	Q37 DID YOU GET INSTRUCTION ON HOW TO USE (THIS/THESE) DEVICE(S)?	Q38 HOW IMPORTANT WOULD YOU SAY THE DEVICE(S) IS/ARE IN YOUR DAY-TO-DAY ACTIVITIES?	Q39A DID YOU USE LARGE PRINT MATERIALS BECAUSE OF PROBLEMS WITH YOUR VISION?	Q39B DID YOU USE TALKING BOOKS BECAUSE OF PROBLEMS WITH YOUR VISION?
N	Valid	3171	302	304	3163	3172
	Missing	9	2878	2876	17	8
Mean		1.90	1.83	2.28	1.93	1.99
Median		2.00	2.00	2.00	2.00	2.00
Mode		2	2	3	2	2

Statistics

		Q39C DID YOU USE OTHER TALKING ITEMS (SUCH AS CLOCKS, WATCHES, CALCULATOR S) BECAUSE OF PROBLEMS WITH YOUR VISION?	Q39D DID YOU USE A WHITE CANE [THAT VISUALLY IMPAIRED AND BLIND PEOPLE OFTEN USE] BECAUSE OF PROBLEMS WITH YOUR VISION?	Q39E DID YOU USE A COMPUTER ADAPTED WITH LARGE PRINT SCREEN OR VOICE OUT-PUT BECAUSE OF PROBLEMS WITH YOUR VISION?	Q39F DID YOU USE A GUIDE DOG? BECAUSE OF PROBLEMS WITH YOUR VISION?	Q39G DID YOU USE ANY OTHER ASSISTIVE DEVICES BECAUSE OF PROBLEMS WITH YOUR VISION?
N	Valid	3171	3172	3167	3170	3169
	Missing	9	8	13	10	11
Mean		1.98	1.99	1.98	2.00	1.96
Median		2.00	2.00	2.00	2.00	2.00
Mode		2	2	2	2	2

Statistics

		Q40 OVERALL, HOW IMPORTANT WOULD YOU SAY THE DEVICE(S) ARE IN YOUR DAY-TO-DAY ACTIVITIES?	Q41_A 1st REPONSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?	Q41_B 2nd REPONSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?	Q41_C 3rd REPONSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?	Q41_D 4th REPONSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?
N	Valid	389	3166	697	244	76
	Missing	2791	14	2483	2936	3104
Mean		1.79	13.45	5.09	5.78	5.89
Median		1.00	9.00	5.00	5.00	5.00
Mode		1	5	1	9	1

Statistics

		Q41_E 5th REPONSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?	Q41_F 6th REPONSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?	Q41_G 7th REPONSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?	Q41_H 8th REPONSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?	Q41_I 9th REPONSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?
N	Valid	28	17	12	11	5
	Missing	3152	3163	3168	3169	3175
Mean		6.58	7.65	8.47	9.85	9.45
Median		6.00	8.00	9.00	9.72	10.00
Mode		5	6	9	9	10

Statistics

		Q41_J 10th REPOSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?	Q41_K 11th REPOSE - DURING THE PAST 12 MONTHS, WHERE HAVE YOU SEEN OR HEARD SOMETHING ABOUT EYE HEALTH OR DISEASE?	Q42A IN THE PAST 12 MONTHS, HAVE YOU TALKED ABOUT EYE HEALTH OR EYE DISEASE WITH A HEALTH CARE PROVIDER WHO IS NOT AN EY	Q42B IN THE PAST 12 MONTHS, HAVE YOU TALKED ABOUT EYE HEALTH OR EYE DISEASE WITH A PHARMACIS T?	Q42C IN THE PAST 12 MONTHS, HAVE YOU TALKED ABOUT EYE HEALTH OR EYE DISEASE WITH A RELATIVE OR FRIEND?
N	Valid	3	0	3162	3173	3164
	Missing	3177	3180	18	7	16
Mean		11.00		1.85	1.98	1.58
Median		11.00		2.00	2.00	2.00
Mode		11		2	2	2

Statistics

		Q42D IN THE PAST 12 MONTHS, HAVE YOU TALKED ABOUT EYE HEALTH OR EYE DISEASE WITH AN EYE CARE PROVIDER (EYE DOCTOR)?	Q42E IN THE PAST 12 MONTHS, HAVE YOU TALKED ABOUT EYE HEALTH OR EYE DISEASE WITH CO- WORKERS/ EMPLOYER?	Q42F IN THE PAST YEAR, HAVE YOU TALKED ABOUT EYE HEALTH OR EYE DISEASE WITH ANYONE ELSE?	Q43 DO YOU HAVE ANY KIND OF HEALTH CARE COVERAGE, INCLUDING HEALTH INSURANCE, PREPAID PLANS SUCH AS HMOS, OR GOVERNMEN T	Q44_A 1st RESPONSE - WHAT TYPE OF HEALTH CARE COVERAGE DO YOU HAVE?
N	Valid	3170	3167	3159	3163	2497
	Missing	10	13	21	17	683
Mean		1.59	1.85	1.97	1.81	4.42
Median		2.00	2.00	2.00	1.00	4.00
Mode		2	2	2	1	4

Statistics

		Q44_B 2nd RESPONSE - WHAT TYPE OF HEALTH CARE COVERAGE DO YOU HAVE?	Q44_C 3rd RESPONSE - WHAT TYPE OF HEALTH CARE COVERAGE DO YOU HAVE?	Q45 HOW MUCH OF THE COST OF A REGULAR EYE EXAM PROVIDED BY AN EYE CARE PROVIDER IS COVERED BY YOUR HEALTH CARE COVERAGE	Q46 DOES YOUR HEALTH CARE COVERAGE AND/OR VISION INSURANCE PAY FOR ANY PART OF THE COST OF THE GLASSES OR CONTACT LENSES?	Q47 DOES YOUR HEALTH CARE COVERAGE AND/OR VISION INSURANCE PAY FOR ANY PART OF VISUAL DEVICES THAT ARE PRESCRIB ED BY AN
N	Valid	269	12	2503	2509	2509
	Missing	2911	3168	677	671	671
Mean		4.35	3.43	13.88	9.71	35.66
Median		4.00	3.00	2.00	1.00	2.00
Mode		4	3	2	1	77

Statistics

		Q48 WHAT IS THE LAST GRADE IN SCHOOL YOU COMPLETE D?	Q49 WHAT IS YOUR CURRENT MARITAL STATUS?	Q50 HOW MANY ADULTS AND CHILDREN PRESENTLY LIVE IN YOUR HOUSEHOLD, COUNTING YOURSELF?	Q51A MAY I HAVE YOUR AGE AS OF YOUR LAST BIRTHDAY?	Q51B WHICH ONE OF THE FOLLOWING CATEGORIES BEST REPRESENT S YOUR AGE AS OF YOUR LAST BIRTHDAY?
N	Valid	3135	3150	3142	3095	44
	Missing	45	30	38	85	3136
Mean		2.65	1.90	2.98	45.47	4.51
Median		3.00	1.00	3.00	43.00	5.00
Mode		2	1	2	18	6

Statistics

		Q52 ARE YOU OF HISPANIC ORIGIN OR DESCENT?	Q53_A 1st RESPONSE - WHICH ONE OR MORE OF THE FOLLOWING BEST DESCRIBES YOUR RACE?	Q53_B 2nd RESPONSE - WHICH ONE OR MORE OF THE FOLLOWING BEST DESCRIBES YOUR RACE?	Q53_C 3rd RESPONSE - WHICH ONE OR MORE OF THE FOLLOWING BEST DESCRIBES YOUR RACE?	Q53_D 4th RESPONSE - WHICH ONE OR MORE OF THE FOLLOWING BEST DESCRIBES YOUR RACE?
N	Valid	3119	3109	21	1	1
	Missing	61	71	3159	3179	3179
Mean		1.89	4.78	3.91		
Median		2.00	5.00	5.00		
Mode		2	5	5		

Statistics

		Q53_E 5th RESPONSE - WHICH ONE OR MORE OF THE FOLLOWING BEST DESCRIBES YOUR RACE?	Q53_F 6th RESPONSE - WHICH ONE OR MORE OF THE FOLLOWING BEST DESCRIBES YOUR RACE?	Q54 WHICH DESCRIBES YOUR TOTAL HOUSEHOLD INCOME BEFORE TAXES IN 2004?	Q55 PLEASE TELL ME YOUR GENDER.	Q12J HAS AN EYE CARE PROVIDER EVER TOLD YOU THAT YOU HAVE ASTIGMATISM?
N	Valid	1	1	2684	3162	130
	Missing	3179	3179	496	18	3050
Mean				4.83	1.52	1.00
Median				5.00	2.00	1.00
Mode				6	2	1

Statistics

		Q13J ARE YOU RECEIVING FOLLOW UP CARE OR TREATMENT FOR ASTIGMATISM?	AGE GROUP	WEIGHTING GEOGRAPHIC REGION	WEIGHTING EDUCATION	WEIGHTING RACE
N	Valid	130	3139	3180	3135	3123
	Missing	3050	41	0	45	57
Mean		1.45	3.51	2.61	2.56	2.16
Median		1.00	3.00	3.00	3.00	2.00
Mode		1	3	3	2	2

Statistics

		Istate	URBAN / SUBURBAN / RURAL
N	Valid	3180	3180
	Missing	0	0
Mean			
Median			
Mode			

APPENDIX J

Issues for Consideration for Future Research

Issues for Consideration for Future Research

Introduction of the Survey

An issue arose during survey fielding that seemed to impact cooperation rates among potential households. The Lions Clubs International Foundation (LCIF) is well-known by the general public for the services it provides, as well as for being a charitable organization. The language contained in the survey introduction immediately introduced LCIF as the sponsor of an important study. Respondents may have reacted to the introduction and the mention of LCIF with the impression that they were being solicited by LCIF for a donation, despite specific language in the survey that this was not the purpose of the call. In future surveys, the introduction might be more effective at averting initial refusals by first stating the purpose and importance of the study (message), followed by disclosure of the study sponsor (messenger). By placing emphasis on the purpose of the study rather than the study sponsor, respondents might focus more on the message than the messenger. We were unable to achieve particular subgroup targets for African Americans. The cooperation rate in the South and West, which contains a higher concentration of African Americans, was lower than that of other regions of the country. It is unknown if the LCIF name evokes strong sentiment in certain regions of the country or among particular subgroups of the United States population, which may have affected respondent cooperation.

Response Categories

Another issue that was identified during data collection was the effect of some of the questions containing many response categories. Examples include Questions 22, 23, 35, and 41. The list of pre-coded responses for these questions is very long. These questions were unaided, meaning that interviewers did not read the list but were instructed to probe for the appropriate response. The argument for creating a lengthy list of pre-coded responses is that it reduces the amount of back-coding and cleaning of open-ended responses during data processing. The experience from this survey, and from other surveys, does not support this position. Matching the open-end response to the most appropriate pre-coded category proved challenging for callers. Long lists interrupt the flow of the interview as the interviewer reviews the list of responses to match the response. This disruption can often lead to respondent frustration. The result was that interviewers entered many responses into the “other-specify” field to maintain

interview flow and rapport. These specify responses were reviewed during data processing and many were found to fit the pre-code list. Such responses were appropriately back-coded. A shorter list of pre-code responses is recommended in the future to facilitate the interview process.

Timeframe for Data Collection

The timing of data collection arguably had a negative effect on response rates. The KAP was fielded in late October and coincided with three major holidays—Thanksgiving, Christmas, and New Year’s. Each of these holidays incorporated a weekend, typically a prime calling period for protocol studies such as the KAP study. Although calling was suspended on each of these official holidays, we experienced a residual negative effect while calling on days surrounding either end of each holiday. To overcome this obstacle and still achieve the targeted number of overall completes, we needed to increase the volume of sample. It is, therefore, our recommendation that future data collection periods be scheduled during times that do not conflict with these holidays.

Impact of Wireless-Only Households

For the 2005 KAP survey, only residential phone numbers were eligible to be called. Non-eligible numbers include businesses, wireless phones, computer and fax lines, pay phones, etc. A recent study conducted by the National Center for Health Statistics found that during the last 6 months of 2005 (when the KAP study was fielded), approximately 7.8% of all adults live in households with only wireless telephones. Two percent (2%) of households do not have any telephone services (wireless or landline).ⁱ

Examining data from the 2004 and 2005 National Health Interview Survey, researchers concluded that as people substitute wireless telephones for landline telephones, the percentage of adults without landline telephones has increased significantly but is still low. This minimized the bias resulting from their exclusion from telephone surveys.ⁱⁱ

Indications are that the number of wireless-only households will continue to rise in coming years. If the KAP survey is replicated in the next 10 to 15 years, consideration should be given to the impact of not including wireless telephone numbers when conducting an RDD telephone survey.

References

- i Blumberg S., & Luke J. (2006). Wireless substitution: preliminary data from the 2005 National health interview survey [Internet]. Atlanta: National Center for Health Statistics; [cited 2006 June 16, 2006]. 3p. Retrieved June 16, 2006 from: <http://www.cdc.gov/nchs/products/pubs/pubd/hestats/wireless/wireless2005.html>
- ii Blumberg S., & Luke J., and Cynamon M. (2006, May). Telephone coverage and health survey estimates: evaluating the need for concern about wireless substitution. *Am J of Public Health*; 96(5), 926-931.

APPENDIX K

Knowledge, Attitudes, and Practices Subanalyses

Knowledge, Attitudes, and Practices Subanalyses

Because people who have an eye condition or disease may be motivated to become more knowledgeable about their condition compared with people who do not have an eye condition or disease, this appendix details findings on the knowledge, attitudes, and practices for adults subdivided into whether they have the named eye disease or condition. The four eye diseases or conditions explained are: (1) glaucoma, (2) age-related macular degeneration (AMD), (3) diabetic eye disease, and (4) refractive errors.

Throughout this appendix, the percentage of respondents answering each question is reported. In cases where percentages are calculated separately for selected subgroups (e.g., men and women) and where there is sufficient statistical evidence demonstrating that the subgroups are different (e.g., men and women responded differently), the probability that the groups' responses are different is presented in a footnote (expressed as a p-value). The p-value represents the probability that the highest and lowest percentages reported are statistically different. To reduce the number of probability statements reported and reduce confusion, we use three probability levels to classify all of the statistically significant differences: $p < .05$, $p < .01$, and $p < .001$. These p-values are indicated in the text using the following superscripts: ^a $=p < .05$, ^b $=p < .01$, and ^c $=p < .001$. Confidence intervals are also provided in the comparison tables below the point estimate.

p-value Legend

^a $=p < .05$, ^b $=p < .01$, and ^c $=p < .001$

Glaucoma

For this analysis, adults categorized as having glaucoma refers to adults who self-report having been told by an eye care professional (ECP) that they have glaucoma. Those categorized as being glaucoma suspect are adults who self-report being told they are glaucoma suspect by an ECP. The demographic characteristics of adults who self-report having glaucoma, those who self-report being glaucoma suspect, and everyone else (without the disease or condition) are presented in Table K-1.

Table K-1: Characteristics of Adults Who Self-Report Having Glaucoma, Adults Who Self-Report Being Glaucoma Suspect, and Everyone Else

Variable	Self-Report Glaucoma*	Self-Report Glaucoma Suspect**	Everyone Else
Age , mean (range)	62	53	44
Gender			
Male	36%	52%	48%
Female	64%	48%	52%
Marital Status***			
Married	51%	72%	60%
Divorced	12%	12%	12%
Widowed	23%	5%	6%
Single (never married)	15%	10%	23%
Race/Ethnicity****			
Hispanic	7%	10%	11%
Asian	6%	2%	4%
Black	19%	6%	10%
Caucasian	67%	78%	73%
Education***			
Some high school	29%	27%	18%
High school graduate	35%	26%	29%
Some college	23%	34%	29%
College graduate	4%	7%	14%
Grad. school prof. degree	8%	6%	10%
Income***			
< \$15,000/yr	36%	24%	18%
\$15,000–\$34,999/yr	34%	24%	24%
\$35,000–\$74,999/yr	16%	38%	33%
\$75,000+/yr	14%	13%	25%
Insurance status			
Insured	84%	84%	79%
Not insured	16%	16%	20%
Don't know			1%

* Adults categorized as with glaucoma are adults who self-report being diagnosed with glaucoma by an ECP.

** Adults categorized as glaucoma suspect are adults who self-report being diagnosed as glaucoma suspect by an ECP.

*** Percentages may not total to 100 percent due to rounding.

**** Percentage will not total 100 percent because only Hispanic, Asian, Black, and Caucasian percentages are presented in this table.

In the following sections, the knowledge, attitudes, practices, and information sources for those who self-report having glaucoma, being glaucoma suspect, and everyone else is described. Tables K-2 to K-5 present the comparisons of adults who self-report having glaucoma, those who self-report being glaucoma suspect, and everyone else.

Knowledge

Adults with glaucoma (98%) and those who are glaucoma suspect (96%) report that they have heard of glaucoma more often than everyone else (90%).^a Among those who report having heard of glaucoma, those with the disease (99%) and those who are glaucoma suspect (96%) are more knowledgeable that glaucoma can cause vision loss compared with everyone else (92%).^a Fifty-five percent (55%) of adults with glaucoma, 64% of glaucoma suspects, and 67% of people who did not report having been told they have glaucoma (everyone else) are knowledgeable that glaucoma has no early warning signs. Adults with glaucoma (96%) and those who are glaucoma suspect (92%) more frequently report that glaucoma can be treated compared with everyone else (85%).^a

Table K-2: Knowledge of Adults Who Self-Report Having Glaucoma, Adults Who Self-Report Being Glaucoma Suspect, and Everyone Else

Variable*	Self-Report Glaucoma**	Self-Report Glaucoma Suspect ***	Everyone Else
Knowledge			
Heard of glaucoma p<.05	98% (94%–100%)	96% (91%–100%)	90% (88%–91%)
Of those who heard of glaucoma:			
Glaucoma can cause vision loss p<.05	99% (97%–100%)	96% (90%–100%)	92% (90%–93%)
There are no early warning symptoms	55%	64%	67%
Vision loss can be prevented	70%	67%	67%
Glaucoma can be treated p<.05	96% (91%–100%)	92% (84%–100%)	85% (83%–87%)

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with glaucoma are adults who self-reported being diagnosed with glaucoma by an ECP.

*** Adults categorized as glaucoma suspect are adults who self-reported being diagnosed as glaucoma suspect by an ECP.

Attitudes

When asked to consider the worst disability that would have the greatest impact on day-to-day life, approximately two-thirds (66%) of adults with glaucoma and two-thirds (65%) of adults who are glaucoma suspect, report loss of eyesight as a 10 on a scale of 1 to 10 (with 10 having the greatest impact). Seventy-one percent (71%) of everyone else also rate loss of eyesight as a 10 on a scale of 1 to 10.

Most adults, regardless of glaucoma status, say they would be likely to seek eye care if encouraged by their primary care provider (PCP). Seventy-four percent (74%) of adults with glaucoma and 80% of glaucoma suspects report that they would be somewhat or very likely to have their eyes examined if a family member suggested they do so.

Table K-3: Attitudes of Adults Who Self-Report Having Glaucoma, Adults Who Self-Report Being Glaucoma Suspect, and Everyone Else

Variable*	Self-Report Glaucoma**	Self-Report Glaucoma Suspect ***	Everyone Else
Attitudes			
Rated loss of eyesight a 10 (10-pt. scale with 10 as the greatest impact)	66%	65%	71%
Likelihood to have an eye exam if suggested by:			
Family member	74%	78%	79%
Primary care provider	98%	96%	95%
Pharmacist	51%	56%	58%
Friends	52%	44%	57%
Coworkers/employer p<.05	57% (46%–69%)	56% (44%–69%)	69% (67%–71%)
Religious leader	39%	40%	43%

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with glaucoma are adults who self-reported being diagnosed with glaucoma by an ECP.

*** Adults categorized as glaucoma suspect are adults who self-reported being diagnosed as glaucoma suspect by an ECP.

Practices

About half of adults with glaucoma, adults who are glaucoma suspect, and those categorized as everyone else report that the main reason for having had their eyes examined most recently was for a regular checkup. Twelve percent (12%) of adults with glaucoma report having had their eyes examined because they needed new glasses or contact lenses. Twenty-four percent (24%) of adults who are glaucoma suspect and 17% of everyone else also report having had their eyes examined because they needed new glasses or contact lenses.

Among the 91% of adults who report having had their eyes examined by some type of health care provider (HCP), more adults with glaucoma (85%) and those who are glaucoma suspect (88%) report having had an eye exam within the past two years than adults categorized as everyone else (73%).^b Regarding practices about receiving eye examinations with dilated pupils, adults with glaucoma (91%) and those who are glaucoma suspect (93%) more often report having their pupils dilated compared with adults categorized as everyone else (73%).^c

Table K-4: Practices of Adults Who Self-Report Having Glaucoma, Adults Who Self-Report Being Glaucoma Suspect, and Everyone Else

Variable*	Self-Report Glaucoma**	Self-Report Glaucoma Suspect ***	Everyone Else
Practices			
Main reason for eye exam:			
Regular checkup	50%	49%	52%
Need new glasses/contacts	12%	24%	17%
Had trouble seeing	16%	11%	13%
When was last eye exam?			
Eye exam within the past two years p<.01	85% (76%–94%)	88% (80%–97%)	73% (71%–75%)
Eye exam two or more years ago or never p<.01	15% (6%–24%)	12% (3%–20%)	27% (25%–29%)
Had pupils dilated p<.001	91% (85%–97%)	93% (86%–99%)	73% (70%–75%)

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with glaucoma are adults who self-reported being diagnosed with glaucoma by an ECP.

*** Adults categorized as glaucoma suspect are adults who self-reported being diagnosed as glaucoma suspect by an ECP.

Information Sources

Thirty-three percent (33%) of adults categorized as everyone else report seeing or hearing something about eye health or disease on television programs or commercials within the past 12 months. Twenty-four percent (24%) of adults with glaucoma and 20% of those who are glaucoma suspect report seeing or hearing something about eye health or disease on television programs or commercials in the same time period. More adults with glaucoma (39%) and those who are glaucoma suspect (45%) report seeing or hearing something about eye health or disease at a doctor’s office or a health clinic than everyone else (22%).^c Twenty-seven percent (27%) of adults with glaucoma, 19% of adults who are glaucoma suspect, and 18% of everyone else report seeing or hearing something about eye health or disease in magazines or newsletters.

Table K-5: Information Sources of Adults Who Self-Report Having Glaucoma, Adults Who Self-Report Being Glaucoma Suspect, and Everyone Else

Variable*	Self-Report Glaucoma**	Self-Report Glaucoma Suspect ***	Everyone Else
Information Sources			
Magazines or newsletters	27%	19%	18%
Television programs or commercials p<.05	24% (14%–33%)	20% (11%–30%)	33% (31%–36%)
At a doctor’s office or clinic P<.001	39% (28%–51%)	45% (33%–57%)	22% (20%–24%)
Haven’t seen or heard anything	21%	20%	23%

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with glaucoma are adults who self-reported being diagnosed with glaucoma by an ECP.

*** Adults categorized as glaucoma suspect are adults who self-reported being diagnosed as glaucoma suspect by an ECP.

Age-Related Macular Degeneration

For this analysis, those identified as having AMD report in the survey that they were told by an ECP that they have AMD. Table K-6 presents demographic characteristics for those adults who self-report having AMD and adults categorized as everyone else.

Table K-6: Characteristics of Adults Who Self-Report Having Age-related Macular Degeneration (AMD) and Everyone Else

Variable	Self-Report AMD*	Everyone Else
Age, mean (range)	61	45
Gender		
Male	54%	48%
Female	46%	52%
Marital Status**		
Married	63%	60%
Divorced	12%	11%
Widowed	16%	6%
Single (never married)	8%	22%
Race/Ethnicity***		
Hispanic	5%	11%
Asian	1%	4%
Black	6%	11%
Caucasian	85%	72%
Education**		
Some high school	13%	19%
High school graduate	42%	29%
Some college	30%	29%
College graduate	6%	14%
Grad. school prof. degree	9%	10%
Income**		
< \$15,000/yr	27%	18%
\$15,000–\$34,999/yr	30%	24%
\$35,000–\$74,999/yr	30%	33%
\$75,000+/yr	14%	25%
Insurance status**		
Insured	89%	80%
Not insured	11%	20%
Don't know		1%

* Adults categorized as with AMD are adults who self-report being diagnosed with AMD by an ECP.

** Percentages may not total to 100 percent due to rounding.

*** Percentage will not total 100 percent because only Hispanic, Asian, Black, and Caucasian percentages are presented in this table.

In the following sections, the knowledge, attitudes, practices, and information sources for those who self-report having AMD and adults categorized as everyone else are described. Tables K-7 to K-10 present comparisons of adults who self-report having AMD and adults categorized as everyone else.

Knowledge

Adults who report being told by an ECP that they have AMD are somewhat more knowledgeable about the disease than those categorized as everyone else. Adults who report being told by an ECP that they have AMD (78%) more frequently report that they heard of AMD compared with those categorized as everyone else (51%).^c

Among those who report having heard of AMD, those with the disease (57%) are more knowledgeable that AMD usually runs in families compared with adults categorized as everyone else (40%).^b Adults with AMD (82%) are more knowledgeable that one can have AMD and not know it compared with those categorized as everyone else (67%).^a Eighty-one percent (81%) of adults with the disease and 70% of those categorized as everyone else are knowledgeable that AMD can cause central vision loss. Lastly, 46% of everyone else and 51% of those with the disease correctly identify that vitamins and zinc can help prevent or slow vision loss from AMD.

Table K-7: Knowledge of Adults Who Self-Report Having Age-related Macular Degeneration (AMD) and Everyone Else*

Variable	Self-Report AMD**	Everyone Else
Knowledge		
Heard of AMD P <.001	78% (69%–87%)	51% (48%–53%)
Of those who heard of AMD:		
Vitamins and zinc can help prevent vision loss from AMD	51%	46%
AMD usually runs in families p<.01	57% (45%–68%)	40% (37%–44%)
One can have AMD and not know p<.05	82% (73%–91%)	67% (64%–70%)
AMD can cause central vision loss	81%	70%

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with AMD are adults who self-reported being diagnosed with AMD by an ECP.

Attitudes

When considering conditions that would affect the day-to-day life of adults, slightly more than two-thirds (67%) of adults with AMD and 71% of adults categorized as everyone else report loss of eyesight as a 10 on a scale of 1 to 10 (with 10 having the greatest impact).

Adults categorized as everyone else (96%) more frequently report that they would be somewhat or very likely to have their eyes examined if their PCP suggested they do so than adults with AMD (91%).^a Fifty-eight percent (58%) of adults categorized as everyone else and 50% of adults with the disease report that they would be somewhat or very likely to have their eyes examined if a pharmacist suggested they do so. Lastly, 43% of those categorized as everyone else and 38% of those with AMD report that their religious leader would be likely to influence them to have an eye examination.

Table K-8: Attitudes of Adults Who Self-Report Having Age-related Macular Degeneration (AMD) and Everyone Else*

Variable	Self-Report AMD**	Everyone Else
Attitudes		
Rated loss of eyesight a 10 (10-pt. scale with 10 as the greatest impact)	67%	71%
Likelihood to have an eye exam if suggested by:		
Family member	76%	79%
Primary care provider p<.05	91% (85%–97%)	96% (95%–97%)
Pharmacist	50%	58%
Friends	56%	56%
Coworkers/employer	66%	68%
Religious leader	38%	43%

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with AMD are adults who self-reported being diagnosed with AMD by an ECP.

Practices

Adults with AMD (92%) more often report having their pupils dilated compared with adults categorized as everyone else (73%).^c Fifty-nine percent (59%) of adults with AMD and 52% of adults categorized as everyone else report that the main reason they had their eyes examined by an ECP was for a regular checkup.

Similar to the findings reported for glaucoma, adults with AMD (90%) more frequently had their eyes examined in the past two years compared with adults categorized as everyone else (73%).^c

Table K-9: Practices of Adults Who Self-Report Having Age-related Macular Degeneration (AMD) and Everyone Else*

Variable	Self-Report AMD**	Everyone Else
Practices		
Main reason for eye exam:		
Regular checkup	45%	52%
Need new glasses/contacts	21%	17%
Had trouble seeing	14%	13%
When was last eye exam?		
Eye exam within the past two years p<.001	90% (84%–97%)	73% (71%–76%)
Eye exam two or more years ago or never p<.001	10% (3%–16%)	27% (24%–29%)
Had pupils dilated p<.001	92% (86%–97%)	73% (71%–76%)

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with AMD are adults who self-reported being diagnosed with AMD by an ECP.

Information Sources

More adults with AMD (35%) report seeing or hearing something about eye health or disease at a doctor’s office or a health clinic within the past year than everyone else (23%).^a Twenty-three percent (23%) of adults categorized as everyone else and 18% of those with the disease report not seeing or hearing anything about eye health or disease.

Table K-10: Information Sources of Adults Who Self-Report Having Age-related Macular Degeneration (AMD) and Everyone Else*

Variable	Self-Report AMD**	Everyone Else
Information Sources		
Magazines or newsletters	17%	19%
Television programs or commercials	30%	33%
At a doctor’s office or clinic p<.05	35% (24%–45%)	23% (21%–25%)
Haven’t seen or heard anything	18%	23%

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with AMD are adults who self-reported being diagnosed with AMD by an ECP.

Diabetic Eye Disease

For this analysis, those identified as having diabetic eye disease report in the survey that they were told by an ECP that they have diabetic eye disease. Demographic characteristics for those who self-report having diabetic eye disease and adults categorized as everyone else are presented in Table K-11.

Table K-11: Characteristics of Adults Who Self-Report Having Diabetic Eye Disease (DED) and Everyone Else

Variable	Self-Report DED*	Everyone Else
Age, mean (range)	62	45
Gender		
Male	52%	48%
Female	48%	52%
Marital Status**		
Married	60%	60%
Divorced	17%	11%
Widowed	19%	6%
Single (never married)	3%	22%
Race/Ethnicity***		
Hispanic	16%	11%
Asian	1%	4%
Black	13%	10%
Caucasian	66%	73%
Education**		
Some high school	36%	19%
High school graduate	36%	29%
Some college	17%	29%
College graduate	8%	14%
Grad. school prof. degree	3%	10%
Income**		
< \$15,000/yr	49%	18%
\$15,000–\$34,999/yr	31%	25%
\$35,000–\$74,999/yr	11%	33%
\$75,000+/yr	9%	25%
Insurance status**		
Insured	89%	80%
Not insured	9%	20%
Don't know	2%	1%

* Adults categorized as with diabetic eye disease are adults who self-report being diagnosed with diabetic eye disease by an ECP.

** Percentages may not total to 100 percent due to rounding.

*** Percentage will not total 100 percent because only Hispanic, Asian, Black, and Caucasian percentages are presented in this table.

In the following sections, the knowledge, attitudes, practices, and information sources for those who self-report having diabetic eye disease and adults categorized as everyone else are described. Tables K-12 to K-15 present the comparisons of adults who self-report having diabetic eye disease and everyone else.

Knowledge

Adults who self-report diabetic eye disease, such as diabetic retinopathy, were usually more knowledgeable about the disease than those categorized as everyone else. All adults with diabetic eye disease (100%) correctly identified that people with diabetes should have a dilated exam at least once per year compared with 85% of everyone else.^c

Among those who report having heard of diabetic eye disease, 77% of those with the disease and 69% of everyone else were knowledgeable that vision loss caused by diabetes can be prevented.

Table K-12: Knowledge of Adults Who Self-Report Having Diabetic Eye Disease (DED) and Everyone Else*

Variable	Self-Report DED**	Everyone Else
Knowledge		
Heard of diabetic eye disease p<.001	85% (71%–99%)	50% (48%–53%)
Of those who had heard of diabetic eye disease:		
People with diabetes are at risk for eye disease	94%	91%
Eye disease caused by diabetes usually has no warning signs	11%	11%
Vision loss caused by diabetes can be prevented	77%	69%
People with diabetes should have a dilated exam at least once per year p<.001	100% (100%–100%)	85% (82%–87%)
Eye disease caused by diabetes can be treated	63%	59%

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with diabetic eye disease are adults who self-reported being diagnosed with DED by an ECP.

Attitudes

When considering conditions that would affect the day-to-day life of adults, 64% of adults with diabetic eye disease and 71% of adults categorized as everyone else report loss of eyesight as a 10 on a scale of 1 to 10 (with 10 having the greatest impact).

Virtually all adults (96%) are likely to seek eye care if encouraged by their PCP regardless of whether they self-report having diabetic eye disease. Fifty-eight percent (58%) of adults categorized as everyone else and 51% of those with the disease report that they would be somewhat or very likely to have their eyes examined if a pharmacist suggested they do so. Thirty-three percent (33%) of those with diabetic eye disease and 43% of those categorized as everyone else report that they would be somewhat or very likely to have their eyes examined if their religious leader suggested they do.

Table K-13: Comparisons of Adults Who Self-Report Having Diabetic Eye Disease (DED) and Everyone Else*

Variable	Self-Report DED**	Everyone Else
Attitudes		
Rated loss of eyesight a 10 (10-pt. scale with 10 as the greatest impact)	64% (46%–81%)	71% (69%–73%)
Likelihood to have an eye exam if suggested by:		
Family member	80%	79%
Primary care provider	98%	96%
Pharmacist	51%	58%
Friends	59%	56%
Coworkers/employer	66%	68%
Religious leader	33%	43%

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with diabetic eye disease are adults who self-reported being diagnosed with DED by an ECP.

Practices

Similar to the findings reported for glaucoma and AMD, adults with diabetic eye disease (96%) more frequently had their eyes examined in the past two years compared with adults categorized as everyone else (74%).^c Adults with diabetic eye disease (93%) more frequently report receiving eye examinations with dilated pupils than everyone else (74%).^a

Fifty-nine percent (59%) of adults with diabetic eye disease and 52% of everyone else report that the main reason they had their eyes examined by an ECP was for a regular checkup. More people with diabetic eye disease (25%) report that the main reason they had their eyes examined was because they had trouble seeing compared with everyone else (13%).^a Adults categorized as everyone else (17%) more often report having had their eyes examined because they needed new glasses or contact lenses compared with adults with diabetic eye disease (1%).^c

Table K-14: Comparisons of Adults Who Self-Report Having Diabetic Eye Disease (DED) and Everyone Else*

Variable	Self-Report DED**	Everyone Else
Practices		
Main reason for eye exam		
Regular checkup	59%	52%
Need new glasses/contacts p<.001	1% (0%–3%)	17% (15%–19%)
Had trouble seeing p<.05	25% (10%–41%)	13% (11%–14%)
When was last eye exam?		
Eye exam within the past two years p<.001	96% (90%–100%)	74% (71%–76%)
Eye exam two or more years ago or never p<.001	4% (0%–10%)	26% (24%–29%)
Had pupils dilated p<.05	93% (82%–100%)	74% (71%–76%)

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with diabetic eye disease are adults who self-reported being diagnosed with DED by an ECP.

Information Sources

More adults with diabetic eye disease (41%) report seeing or hearing something about eye health or disease at a doctor’s office or a health clinic within the past year than adults categorized as everyone else (23%).^a Twenty-three percent (23%) of adults categorized as everyone else and 17% of those with the disease report not seeing or hearing anything about eye health or disease.

Table K-15: Comparisons of Adults Who Self-Report Having Diabetic Eye Disease (DED) and Everyone Else*

Variable	Self-Report DED**	Everyone Else
Information Sources		
Magazines or newsletters	15%	19%
Television programs or commercials	32%	33%
At a doctor’s office or clinic p<.05	41% (22%–60%)	23% (21%–25%)
Haven’t seen or heard anything	17%	23%

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with diabetic eye disease are adults who self-reported being diagnosed with DED by an ECP.

Refractive Errors

For this analysis, those identified as having refractive errors report in the survey that they wear some type of eyewear (i.e., glasses, contact lenses, and/or reading glasses). Demographic characteristics for those adults who self-report having refractive errors and everyone else are presented in Table K-16.

Table K-16: Characteristics of Adults Who Self-Report Having Refractive Errors and Everyone Else

Variable	Self-Report Refractive Errors*	Everyone Else
Age, mean (range)	51	34
Gender		
Male	43%	57%
Female	57%	43%
Marital Status**		
Married	63%	55%
Divorced	12%	10%
Widowed	9%	2%
Single (never married)	16%	34%
Race/Ethnicity**		
Hispanic	6%	21%
Asian	4%	3%
Black	10%	12%
Caucasian	78%	61%
Education		
Some high school	15%	27%
High school graduate	29%	29%
Some college	31%	25%
College graduate	14%	12%
Grad. school prof. degree	11%	7%
Income		
< \$15,000/yr	17%	22%
\$15,000–\$34,999/yr	24%	26%
\$35,000–\$74,999/yr	34%	30%
\$75,000+/yr	25%	22%
Insurance status		
Insured	85%	68%
Not insured	14%	31%
Don't know	1%	1%

* Adults categorized as with refractive errors are adults who self-report use of some type of eyewear.

** Percentages may not total to 100 percent due to rounding.

*** Percentage will not total 100 percent because only Hispanic, Asian, Black, and Caucasian percentages are presented in this table.

In the following sections, the knowledge, attitudes, practices, and information sources for those adults who self-report having refractive errors and everyone else are described. Tables K-17 to K-20 present the comparisons of adults who self-report having refractive errors and everyone else.

Knowledge

Adults with refractive errors (95%) more frequently report that they heard of glaucoma compared with everyone else (80%).^c Sixty percent (60%) adults with refractive errors report that they heard of AMD compared with 36% of everyone else.^c Adults with refractive errors (56%) say that they heard of diabetic eye disease more often than those categorized as everyone else (39%).^c Across both groups, adults were largely uninformed about low vision. However, more adults categorized as everyone else (19%) report that they had heard of low vision compared with adults with refractive errors (14%).^a

Table K-17: Knowledge of Adults Who Self-Report Having Refractive Errors and Everyone Else*

Variable	Self-Report Refractive Errors**	Everyone Else
Knowledge		
Heard of glaucoma p<.001	95% (94%–96%)	80% (77%–84%)
Heard of AMD p<.001	60% (57%–63%)	36% (31%–40%)
Heard of diabetic eye disease p<.001	56% (54%–59%)	39% (35%–44%)
Heard of low vision p<.05	14% (12%–16%)	19% (15%–23%)

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with refractive errors are adults who self-reported use of some type of eyewear.

Attitudes

When considering conditions that would affect the day-to-day life of adults, 70% of adults with refractive errors and 71% of adults categorized as everyone else report loss of eyesight as a 10 on a scale of 1 to 10 (with 10 having the greatest impact).

Virtually all adults are likely to seek eye care if encouraged by their PCP regardless of whether they self-report having refractive errors or not. Adults categorized as everyone else (64%) more frequently report that they would be somewhat or very likely to have their eyes examined if a pharmacist suggested they do so than adults with refractive errors (55%).^c Similarly, adults categorized as everyone else (72%) more frequently report that they would be somewhat or very likely to have their eyes examined if their coworkers or employer suggested they do so compared with adults with refractive errors (66%).^a Adults categorized as everyone else (48%) report being more likely to get an exam if recommended to do so by a religious leader compared with those with refractive errors (40%).^b

Table K-18: Knowledge of Adults Who Self-Report Having Refractive Errors and Everyone Else*

Variable	Self-Report Refractive Errors**	Everyone Else
Attitudes		
Rated loss of eyesight a 10 (10-pt. scale with 10 as the greatest impact)	70% (68%–73%)	71% (67%–76%)
Likelihood to have an eye exam if suggested by:		
Family member	77%	81%
Primary care provider	96%	94%
Pharmacist p<.001	55% (52%–58%)	64% (60%–68%)
Friends	55%	58%
Coworkers/employer p<.05	66% (64%–69%)	72% (68%–76%)
Religious leader p<.01	40% (38%–43%)	48% (43%–53%)

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with refractive errors are adults who self-reported use of some type of eyewear.

Practices

Among the 91% of adults who report having had their eyes examined by some type of HCP, 48% of adults categorized as everyone else had their eyes examined in the past two years compared with 85% of adults with refractive errors.^c Adults with refractive errors (84%) more often report having their pupils dilated compared with adults categorized as everyone else (51%).^c

Fifty-five percent (55%) of adults categorized as everyone else and 50% of adults with refractive errors report that the main reason they had their eyes examined by an ECP was for a regular checkup. Adults with refractive errors (22%) more frequently report having had their eyes examined because they needed new glasses or contact lenses compared with those categorized as everyone else (3%).^c Lastly, adults with refractive errors (16%) more often say that they had their eyes examined because they had trouble seeing compared with those categorized as everyone else (6%).^c

Table K-19: Practices of Adults Who Self-Report Having Refractive Errors and Everyone Else*

Variable	Self-Report Refractive Errors**	Everyone Else
Practices		
Main reason for eye exam:		
Regular checkup	50%	55%
Need new glasses/contacts p<.001	22% (20%–25%)	3% (1%–5%)
Had trouble seeing p<.001	16% (14%–18%)	6% (4%–8%)
When was last eye exam?		
Eye exam within the past two years p<.001	85% (83%–87%)	48% (43%–53%)
Eye exam two or more years ago or never p<.001	15% (13%–17%)	52% (47%–57%)
Had pupils dilated p<.001	84% (82%–86%)	51% (46%–56%)

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with refractive errors are adults who self-reported use of some type of eyewear.

Information Sources

More adults with refractive errors (28%) report seeing or hearing something about eye health or disease at a doctor’s office or a health clinic within the past year than everyone else (15%).^c Twelve percent (12%) of adults categorized as everyone else report seeing or hearing something about eye health or disease in magazines or newsletters within the past year compared with 22% of adults with refractive errors.^c Those adults categorized as everyone else (29%) more frequently report not seeing or hearing anything about eye health or disease than those with refractive errors (19%).^c

Table K-20: Information Sources of Adults Who Self-Report Having Refractive Errors and Everyone Else*

Variable	Self-Report Refractive Errors**	Everyone Else
Information Sources		
Magazines or newsletters p<.001	22% (20%–25%)	12% (9%–15%)
Television programs or commercials	32%	33%
At a doctor’s office or clinic p<.001	28% (25%–30%)	15% (12%–18%)
Haven’t seen or heard anything p<.001	19% (17%–21%)	29% (24%–33%)

* Probability values are provided for those estimates that are significantly different.

** Adults categorized as with refractive errors are adults who self-reported use of some type of eyewear.