2013-2014
NATIONAL ADULT TOBACCO SURVEY (NATS) SAMPLE DESIGN AND METHODOLOGY REPORT

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## 1. Introduction

The 2013-2014 National Adult Tobacco Survey (NATS), a stratified, random digit dialed (RDD), telephone survey of non-institutionalized adults 18 years of age and older, was conducted from October 2013 to October 2014. The survey was part of a collaborative effort between the U.S. Centers for Disease Control and Prevention (CDC) and the U.S. Food and Drug Administration (FDA). The purpose of the survey was to determine the prevalence and correlates of tobacco use behaviors among a nationally representative sample of U.S. adults.

Data were collected by 263 interviewers who completed 70,487 full interviews and 4,746 eligible partial interviews for a total of 75,233 qualified interviews. Throughout this document, references to "completes" or "completed surveys" includes eligible partials unless otherwise stated. Eligible partial interviews consist of records where the respondent answered through Question 83: Marital Status, which is the first demographic question, and $59 \%$ of the total number of interview questions. The completion threshold of $59 \%$ was based on common industry practices for similar health-related surveys and ensured that eligible partial interviews included all questions needed to determine smoking status and to determine use of all assessed tobacco products. A total sample of 75,233 cases were used for weighting the data.

## 2. The NATS Instrument

### 2.1 NATS Instrument Background

The CDC and the American Legacy Foundation originated the NATS, which was previously administered as a one-time survey in 2009-2010. The original NATS questionnaire was designed using constructs from the Key Outcome Indicators for Evaluating Comprehensive Tobacco Control Programs, CDC's comprehensive framework for evaluating tobacco control programs. It was developed to evaluate progress towards National Tobacco Control Program (NTCP) and Healthy People 2020 goals.

As part of a collaboration effort between the the CDC and FDA, the 2012-2013 NATS was revised to add items to inform the FDA's tobacco regulatory activities in protecting the public's health. Measures added to the questionnaire assessed nicotine dependence, risk perceptions, susceptibility of initiation among young adults and exposure to marketing. Questions were expanded to encompass the full spectrum of products currently available on the market.

In 2013-2014 the NATS was further revised by adding 17 questions, deleting 3 questions, and modifying 9 questions. Specifically,

- A question about cigarette brands was added to gather information on brand preference among cigarette consumers and obtain price-related promotions information by brand (Q10 CIGARBRAND, CIGARBRAND_OTH). A similar question was included in the 2009-2010 NATS.
- In order to monitor the use of flavored tobacco products, consumers of flavored tobacco products were asked the flavor(s) of each tobacco product used (Q26 CIGARFLAV2A-F and CIGARFLAV2_OTH, Q38 PIPEFLAV2A-F and PIPEFLAV2_OTH, Q44 ECIGFLAV2A-F and ECIGFLAV2_OTH, Q61 SMKLSFLAV2A-F and SMKLSFLAV2_OTH)
- The single gender question was split into two different questions to gather both current gender (Q90 GENDER) and gender at birth (Q91 GENDERB).
- Two questions about cell phone usage were removed because they were no longer needed for weighting purposes.
- Five questions, similar to questions included in the 2009-2010 NATS, were added (Q92 EMPLOY2, Q99 HOUSINGTYPE, Q136 SMOKHOME7D2, Q138 SHSEXPWORK, Q139 SHSWORKPOL). Topics covered in the questions included:
- Employment status and smoke exposure at work; and
- Housing type and smoke exposure at home.
- A question asking about how harmful the respondent thinks using dissolvable tobacco is to a person's health was replaced by a similar question asking about the perceived harmfulness of electronic cigarettes (Q127 HARMECIG).
- The series of questions measuring exposure to different types of tobacco marketing and promotion were modified. Previously, these questions only asked about direct mail and were altered to include e-mail. They were also adapted to differentiate between companies that market e-cigarettes and companies that manufacture cigarettes or other tobacco products (Q101 RECEIVPROMO1A-2D).
- A question for current tobacco users was deleted. The question asked how concerned respondents were about their smoking affecting the health of someone else.
- A series of questions designed to collect information about purchasing habits of cigarette consumers and obtain information on tax avoidance and evasion was added (Q117 BUYST, Q118 BUYST2, Q119 BUYRES, Q120 BUYST3). These questions asked about purchase of tobacco products outside the respondent's state or country, and on Indian reservations.
- A question about quitting other tobacco products was modified. In 2012-2013, Q59 OTHQUITALL, asked whether respondents who used cigarettes and another product completely quit using all tobacco products. In 2013-2014, the wording was modified to insert the specific products used, tailoring the text for each respondent based on the products used. A new variable name was assigned: Q64 QUITCOM.
- In 2013-2014, the question about the brand name of the cigar, cigarillo, or little filtered cigar (Q26 CIGARBRAND) included a list of common brands. In 2012-2013 it was an open-ended question. During the 2012-2013 NATS, as well as during Oct 2013-Jan 2014 the question was not asked of respondents who did not have a usual size of cigar that they smoked. Starting in February 2014, it was asked of respondents who did not have a usual size.


### 2.2 Questionnaire Content

The questionnaire was divided into 12 sections. Table 2-1 identifies these sections and the number of questions within each section. The table also shows the total number of non-tobacco-related questions within each section. The content was very similar to the 2012-2013 NATS questionnaire, with the exception of the changes described above.

Table 2-1. NATS Questionnaire: Number of Questions by Topic

| Section | Total Number of Questions | Non-tobacco-related Questions |
| :--- | :---: | :---: |
| Introductory Questions | 2 | 2 |
| Cigarette Smoking | 16 | 0 |
| Susceptibility - Cigarettes | 3 | 0 |
| Other Tobacco Products | 44 | 0 |
| Addiction | 7 | 0 |
| Cessation | 8 | 0 |
| Demographic Items | 17 | 17 |
| Marketing/Public Education | 11 | 0 |
| Purchasing | 10 | 0 |
| Knowledge/Attitudes/Perceptions | 13 | 0 |
| Secondhand Smoke | 7 | 0 |
| Closing Questions | 2 | 2 |
| Total | 140 | 21 |

### 2.3 Cognitive Testing

Before fielding the final instrument, selected items were cognitively tested with a total of nine respondents in English and Spanish to identify and remove potential causes of response error.

Respondents with a variety of demographic backgrounds were recruited for the cognitive testing, using a database of opt-in respondents from a contractor company.

To be eligible, participants had to be 18 years of age or older and be a current or former smoker. An additional eligibility requirement was that respondents must not have participated in any interview or focus group for at least 30 days prior to the NATS interviews.

Each respondent received an informed consent form, which included a description of the study, potential risks of participating, the right to terminate participation at any point in time, steps taken to protect anonymity, and how interview information would be handled and used.

Only new questionnaire items or revised items were tested. Interviewers administered the selected items from the questionnaire, using follow-up probes focused primarily on item interpretation and ease of response.

Each respondent received $\$ 75$ as compensation for his or her time. A full report of cognitive testing results was delivered to FDA and CDC in August of 2013.

### 2.4 TransLations

The Spanish translation of the 2012-2013 NATS questionnaire was updated for use during the 2013-2014 survey year. New or revised questions were translated utilizing culturally appropriate source document preparation and back translations.

## 3. Sampling Methodology

### 3.1 SAMPLE DESIGN

The sample design was a dual-frame RDD sample, with independent samples drawn from landline and cell phone frames. The NATS 2013-2014 used a non-overlapping design, where the cell phone frame was used only to find households that were cell-phone only (i.e., households that rely exclusively on cell phones because they do not have a landline to use for receiving calls). The samples from each frame were also disproportionately stratified by state to ensure adequate representation of each state, as well as higher numbers of completed surveys from states with larger populations. Listed landline phone numbers (numbers that were matched to an address) were over-sampled versus unlisted numbers at a ratio of 1.5 to 1 . Cell phone numbers were screened for activity status using Marketing Systems Group's (MSG's) CellWINS service. Cell numbers that were flagged as active were over-sampled versus numbers with inactive or unknown status at a ratio of 3.6 to 1 .

A total of $1,649,040$ phone numbers were sampled through the RDD process, including 1,057,053 landline numbers and 591,987 cell phone numbers. The universe for the 2013-2014 NATS consisted of noninstitutionalized adults (ages 18 years and older) residing in the 50 states and the District of Columbia (DC). Interviews were not conducted with adults living in group quarters. Group quarters (GQ) are places where people live or stay, in a group living arrangement, which is owned or managed by an entity or organization providing housing and/or services for the residents.

ICF International, a contractor company, selected both the cell and landline RDD samples using Virtual Genesys, an online sampling system provided by Marketing Systems Group (MSG).

The sample design for the 2013-2014 NATS had specific semi-proportional goals by state and by sample frame. Each state and the overall sample goals included 30 percent cell-only households and 70 percent landline households (regardless of whether they also had a cell phone).

The state goals included a minimum of 1,000 combined completes ( 700 landline and 300 cell-only) from each state. Thirty states plus the District of Columbia had goals of 1,000 interviews, accounting for 31,000 of the 75,000 target completes. The 20 most populous states had goals above 1,000 interviews, with the remaining 44,000 completes distributed across these states in approximate proportion to their populations.

ICF actively tracked data collection progress throughout the study and adjusted the number of sampled records for each target a monthly basis. Actual production yielded numbers of complete surveys that were very close to state goals, and ICF met between 98.5 percent and 102.5 percent of the goal for each state. Table 3-1 compares the actual numbers of completed surveys by state for each sample type and overall.

Table 3-1. Completes and Goals, by State and Sample Type

| State | Landline Sample |  |  | Cell Sample |  |  | Overall |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Completes | Goal | \% of Goal Met | Completes | Goal | \% of Goal Met | Completes | Goal | \% of Goal Met |
| Alabama | 704 | 700 | 100.6\% | 301 | 300 | 100.3\% | 1,005 | 1,000 | 100.5\% |
| Alaska | 701 | 700 | 100.1\% | 300 | 300 | 100.0\% | 1,001 | 1,000 | 100.1\% |
| Arizona | 898 | 879 | 102.2\% | 385 | 377 | 102.3\% | 1,283 | 1,255 | 102.2\% |
| Arkansas | 697 | 700 | 99.6\% | 301 | 300 | 100.3\% | 998 | 1,000 | 99.8\% |
| California | 4,891 | 4,904 | 99.7\% | 2,107 | 2,102 | 100.2\% | 6,998 | 7,005 | 99.9\% |
| Colorado | 700 | 700 | 100.0\% | 306 | 300 | 102.0\% | 1,006 | 1,000 | 100.6\% |
| Connecticut | 697 | 700 | 99.6\% | 302 | 300 | 100.7\% | 999 | 1,000 | 99.9\% |
| Delaware | 722 | 700 | 103.1\% | 298 | 300 | 99.3\% | 1,020 | 1,000 | 102.0\% |
| District of Columbia | 695 | 700 | 99.3\% | 298 | 300 | 99.3\% | 993 | 1,000 | 99.3\% |
| Florida | 2,480 | 2,458 | 100.9\% | 1,055 | 1,053 | 100.2\% | 3,535 | 3,511 | 100.7\% |
| Georgia | 1,295 | 1,303 | 99.4\% | 573 | 559 | 102.6\% | 1,868 | 1,862 | 100.3\% |
| Hawaii | 701 | 700 | 100.1\% | 303 | 300 | 101.0\% | 1,004 | 1,000 | 100.4\% |
| Idaho | 700 | 700 | 100.0\% | 304 | 300 | 101.3\% | 1,004 | 1,000 | 100.4\% |
| Illinois | 1,690 | 1,703 | 99.2\% | 731 | 730 | 100.2\% | 2,421 | 2,433 | 99.5\% |
| Indiana | 867 | 848 | 102.2\% | 370 | 364 | 101.8\% | 1,237 | 1,212 | 102.1\% |
| Iowa | 692 | 700 | 98.9\% | 302 | 300 | 100.7\% | 994 | 1,000 | 99.4\% |
| Kansas | 702 | 700 | 100.3\% | 302 | 300 | 100.7\% | 1,004 | 1,000 | 100.4\% |
| Kentucky | 717 | 700 | 102.4\% | 298 | 300 | 99.3\% | 1,015 | 1,000 | 101.5\% |
| Louisiana | 692 | 700 | 98.9\% | 310 | 300 | 103.3\% | 1,002 | 1,000 | 100.2\% |
| Maine | 700 | 700 | 100.0\% | 302 | 300 | 100.7\% | 1,002 | 1,000 | 100.2\% |
| Maryland | 762 | 755 | 101.0\% | 332 | 323 | 102.7\% | 1,094 | 1,078 | 101.5\% |
| Massachusetts | 883 | 873 | 101.2\% | 380 | 374 | 101.6\% | 1,263 | 1,247 | 101.3\% |
| Michigan | 1,332 | 1,307 | 101.9\% | 555 | 560 | 99.1\% | 1,887 | 1,867 | 101.1\% |
| Minnesota | 701 | 700 | 100.1\% | 307 | 300 | 102.3\% | 1,008 | 1,000 | 100.8\% |
| Mississippi | 692 | 700 | 98.9\% | 293 | 300 | 97.7\% | 985 | 1,000 | 98.5\% |


| State | Landline Sample |  |  | Cell Sample |  |  | Overall |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Completes | Goal | \% of Goal Met | Completes | Goal | \% of Goal Met | Completes | Goal | \% of Goal Met |
| Missouri | 779 | 791 | 98.5\% | 344 | 339 | 101.5\% | 1,123 | 1,130 | 99.4\% |
| Montana | 703 | 700 | 100.4\% | 306 | 300 | 102.0\% | 1,009 | 1,000 | 100.9\% |
| Nebraska | 708 | 700 | 101.1\% | 298 | 300 | 99.3\% | 1,006 | 1,000 | 100.6\% |
| Nevada | 695 | 700 | 99.3\% | 296 | 300 | 98.7\% | 991 | 1,000 | 99.1\% |
| New Hampshire | 705 | 700 | 100.7\% | 292 | 300 | 97.3\% | 997 | 1,000 | 99.7\% |
| New Jersey | 1,158 | 1,149 | 100.7\% | 487 | 493 | 98.9\% | 1,645 | 1,642 | 100.2\% |
| New Mexico | 699 | 700 | 99.9\% | 302 | 300 | 100.7\% | 1,001 | 1,000 | 100.1\% |
| New York | 2,589 | 2,576 | 100.5\% | 1,115 | 1,104 | 100.9\% | 3,704 | 3,680 | 100.7\% |
| North Carolina | 1,228 | 1,245 | 98.7\% | 539 | 533 | 101.0\% | 1,767 | 1,778 | 99.4\% |
| North Dakota | 714 | 700 | 102.0\% | 303 | 300 | 101.0\% | 1,017 | 1,000 | 101.7\% |
| Ohio | 1,524 | 1,517 | 100.5\% | 658 | 650 | 101.2\% | 2,182 | 2,167 | 100.7\% |
| Oklahoma | 701 | 700 | 100.1\% | 296 | 300 | 98.7\% | 997 | 1,000 | 99.7\% |
| Oregon | 699 | 700 | 99.9\% | 302 | 300 | 100.3\% | 1,001 | 1,000 | 100.1\% |
| Pennsylvania | 1,662 | 1,663 | 100.0\% | 723 | 713 | 101.5\% | 2,385 | 2,375 | 100.4\% |
| Rhode Island | 723 | 700 | 103.3\% | 302 | 300 | 100.7\% | 1,025 | 1,000 | 102.5\% |
| South Carolina | 701 | 700 | 100.1\% | 295 | 300 | 98.3\% | 996 | 1,000 | 99.6\% |
| South Dakota | 695 | 700 | 99.3\% | 303 | 300 | 101.0\% | 998 | 1,000 | 99.8\% |
| Tennessee | 862 | 834 | 103.4\% | 354 | 357 | 99.1\% | 1,216 | 1,191 | 102.1\% |
| Texas | 3,273 | 3,317 | 98.7\% | 1,439 | 1,422 | 101.2\% | 4,712 | 4,739 | 99.4\% |
| Utah | 700 | 700 | 100.0\% | 300 | 300 | 100.0\% | 1,000 | 1,000 | 100.0\% |
| Vermont | 701 | 700 | 100.1\% | 299 | 300 | 99.7\% | 1,000 | 1,000 | 100.0\% |
| Virginia | 1,043 | 1,047 | 99.7\% | 462 | 449 | 103.0\% | 1,505 | 1,495 | 100.7\% |
| Washington | 891 | 888 | 100.4\% | 377 | 380 | 99.1\% | 1,268 | 1,268 | 100.0\% |
| West Virginia | 696 | 700 | 99.4\% | 301 | 300 | 100.3\% | 997 | 1,000 | 99.7\% |
| Wisconsin | 742 | 746 | 99.5\% | 325 | 320 | 101.7\% | 1,067 | 1,065 | 100.2\% |
| Wyoming | 692 | 700 | 98.9\% | 306 | 300 | 102.0\% | 998 | 1,000 | 99.8\% |
| Total | 52,594 | 52,500 | 100.2\% | 22,639 | 22,500 | 100.6\% | 75,233 | 75,000 | 100.3\% |

### 3.1.1 LANDLINE SAMPLES

The NATS landline sample consisted of a list-assisted RDD sample of telephone numbers. To build the listassisted frame, all possible telephone numbers were divided into blocks (or banks) of 100 numbers (e.g., 617-492-1200 to 617-492-1299). A 100-block is the series of 100 phone numbers defined by the last two digits of a 10-digit telephone number. For phone numbers with the first eight digits in common, there are 100 possible combinations of the last two digits (ranging from 00-99). To enhance efficiency and reduce costs, the frame excludes zero-blocks, i.e., those 100-blocks with zero listed phone numbers. As mentioned above, landline numbers were classified into listed and unlisted substrata based on whether the phone number was linked to an address in MSG's databases. Because listed landline numbers are much more likely to reach residential households, ICF used a sampling ratio of 1.5 -to-1 for selection of telephone numbers from the listed and unlisted substrata, respectively to allow greater efficiency. This oversampling increased the sampling efficiency by raising the percentage of working residential numbers selected in the sample. The sample was selected in independent replicates to facilitate the control of the final number of completed interviews.

Telephone numbers were stratified into state-based strata according to the primary state served (by the area code and prefix). Telephone numbers were not pre-dialed by MSG.

### 3.1.2 Cell Phone Sample

The cell phone sample was an RDD sample of phone numbers from cell phone exchanges. The cell phone sampling frame contained all possible telephone numbers from cellular-dedicated, "thousand block" sets of telephone numbers with the same area code and prefix. A "thousand block" is a set of 1,000 telephone numbers with the same area code, prefix, first digit of the suffix, and all permutations of the last three digits of the suffix (from 000 to 999). The "thousand block" sets originated from the Telcordia® LERG. The cellular-dedicated banks were then identified by coding provided on the LERG. The NATS cell phone sample was stratified explicitly by state to help control the geographic distribution of the sample. As mentioned above, cell phone numbers were classified into active, inactive, or unknown substrata based on the activity status obtained when MSG's pre-dialed the numbers. The sample cell sample was substratified and ICF oversampled telephone numbers in the active substratum relative to records in the combined inactive and unknown substratum at a ratio of 3.6 to 1 . This oversampling increased the sampling efficiency by raising the percentage of working residential numbers selected in the sample. The sample was selected in independent replicates to facilitate the control of the final number of completed interviews.

The goal tracking process for cell-only surveys used the state identified by the area code and prefix of the cell phone number. However, many cell phone respondents likely lived in a state other than the one indicated by their phone number. The state-level analysis and reporting done with the NATS data will use the actual state of residence reported rather than the state indicated by area code and exchange. The actual state of residence was not collected until late in the interview (and then only for people who completed the interview), making it impractical to manage state goals using actual state. The CDC has handled this issue in other nationwide surveys and has found that the net nationwide effect has a relatively minor impact on the overall geographic distribution of cell phone respondents.

## 4. Data Collection Methodology

### 4.1 Pre-test

ICF fielded the pre-test on September 11, 2013 to evaluate the order and flow of the entire questionnaire. A total of nine interviews were conducted; three by cell phone and six by landline telephone. ICF interviewers screened households to identify and conduct interviews with respondents from a variety of demographic backgrounds, with minimum targets within each of the following categories:

- Cigarette smokers and non-smokers;
- Males and females;
- English and Spanish speakers; and
- Respondents younger than 30 and those older than 30.

Recordings of all nine interviews were reviewed by CDC and FDA. Four minor questionnaire changes were identified as a result of the pre-test, described below.

1. The response category "DID NOT BUY ANY CIGARETTE DURING THE PAST 30 DAYS" was added to the cigarette brand question (Q10 CIGBRAND).
2. The length of the introductory text at Q22 CIGARPAST was reduced, as presented in Table 4-1.

## Table 4-1. Text Modifications to Question 22 CIGARPAST

## Text Modification to Question 22 CIGARPAST

## Prior to Pre-test

## After Pre-test

The next questions ask about tobacco products that you might smoke other than cigarettes, specifically cigars, cigarillos and little filtered cigars. "Cigarillos" are medium cigars that sometimes are sold with plastic or wooden tips. Some common brands are Black and Mild's, Swisher Sweets, Dutch Masters and Phillies Blunts. Cigarillos are usually sold individually or in packs of 5 or 8 . In contrast, little filtered cigars look like cigarettes and are usually brown in color. Like cigarettes, little filtered cigars have a spongy filter and are sold in packs of 20 . Some common brands are Prime Time and Winchester little filtered cigars.

The next questions ask about cigars, cigarillos and little filtered cigars. "Cigarillos" are medium cigars that sometimes are sold with plastic or wooden tips. Some common brands are Black and Mild's, Swisher Sweets, Dutch Masters and Phillies Blunts. In contrast, little filtered cigars look like cigarettes and are usually brown in color. Some common brands are Prime Time and Winchester little filtered cigars.
3. Interviewer notes were added to assist with coding Question 96 EMPLOY2:

- INTERVIEWER CODE THE FOLLOWING RESPONSES AS NO: Disabled, unable to work, out of work, retired, a student that is not employed for wages, a homemaker that is not employed for wages.
- INTERVIEWER CODE THE FOLLOWING RESPONSES AS YES: Employed for wages (either part-time or full-time), self-employed.

4. Probes were added to assist with coding Question 99 HOUSINGTYPE:

- PROBE: "A house, an apartment or something else?"
- IF HOUSE: "A one-family house detached from any other house or a one-family house attached to one or more houses"
- IF APARTMENT: "How many apartments or living units?"
- IF SOMETHING ELSE: "A mobile home, boat, RV, van, or some other type of living space?"


### 4.2 Methods to Increase Survey Participation

### 4.2.1 Advance Letters

Advance letters were sent to all sampled households for which addresses were obtained. A copy of the advance letter appears in Appendix B. Letters were double-sided with English on one side and Spanish on the other and were addressed "Dear Resident". Respondent names and addresses were printed on the letter so that they showed through a window on the envelope. All envelopes included the official CDC logo. Because cell phone numbers could not be reverse-matched for addresses, cell phone respondents did not receive an advance letter. Table 4-2 shows the mail dates and the quantity mailed by month.

Table 4-2: Advanced Mail Dates and Quantities

| Sample Wave Month | Mail Date | Quantity |
| :--- | :--- | :--- |
| October | $10 / 10 / 2013$ | 29,517 |
| November | $10 / 30 / 2013$ | 30,246 |
| December | $11 / 27 / 2013$ | 23,811 |
| January | $12 / 27 / 2013$ | 24,109 |
| February | $01 / 28 / 2014$ | 24,887 |
| March | $02 / 26 / 2014$ | 24,633 |
| April | $03 / 28 / 2014$ | 25,129 |
| May | $04 / 25 / 2014$ | 26,464 |
| June | $05 / 27 / 2014$ | 27,455 |
| July | $07 / 01 / 2014$ | 27,370 |
| August | $07 / 29 / 2014$ | 30,232 |
| September | $09 / 03 / 2014$ | 39,735 |
| Total |  | 333,588 |

### 4.2.2 Respondent Verification Line

ICF programmed an inbound Interactive Voice Response (IVR) system with pre-recorded messages about the NATS project. Calls to the toll-free number were seamlessly routed to the IVR. The IVR offered the following menu options:

- Learn more about the study;
- Speak directly to a call center supervisor; and
- Leave a message (e.g., request removal from calling, set up an appointment to do the survey, etc.).

If a respondent chose to speak to a call center supervisor, he or she was routed to a supervisor in the ICF call center who answered respondent questions, routed respondents who wanted to complete the interview, scheduled call-backs, or removed respondents from calling. The IVR script appears in Appendix C.

### 4.2.3 CALLER ID

ICF pulsed out the text "CDC Survey" and the phone number "802-861-7713" to be displayed on the respondent's Caller ID. If a respondent dialed the phone number displayed on the Caller ID, he or she was routed to the IVR system and offered the menu options described in section 4.2.2.

### 4.3 Interviewer Training

### 4.3.1 Training Manual and FAQ Development

ICF project management staff created a NATS training manual and Frequently Asked Questions (FAQ) sheet for interviewers. The training manual contained information about the survey's background, purpose and scope, population, dialing protocols, and other relevant project information. The FAQ sheet contained pre-emptive refusal aversion statements designed to address respondent concerns, as well as responses to more general respondent questions, such as how phone numbers were selected.

### 4.3.2 Training

### 4.3.2.1 BASIC training

NATS interviewers, as is standard for all ICF interviewers, participated in a general interviewer training upon hire, prior to conducting interviews on any survey. This rigorous two-day training:

- Gave interviewers an excellent foundation in proper interviewing techniques;
- Taught interviewers techniques for gaining respondent trust and cooperation;
- Provided interviewers instruction in how to work efficiently within the Computer-Assisted Telephone Interviewing (CATI) program software;and
- Emphasized the importance of survey work and their role within each of ICF's projects.

Interviewers received extensive hands-on practice with the CATI system and worked through an exhaustive series of practice interviews and interviewing situations.

ICF trainers discussed techniques for:

- Handling difficult situations;
- Probing for answers in challenging situations;
- Identifying the correct adult in the household; and
- Additional refusal aversion/conversion techniques.

Interviewers then conducted more practice interviews with one another. As they practiced, they were monitored by supervisors or senior interviewers who introduced them to a wide variety of different
situations that could arise during an interview. After completing the general interviewer training, new interviewers remained in the "incubator" for two weeks. The incubator provides an environment for less experienced interviewers to receive additional monitoring and supervision. The ratio of floor supervisors and Team Leads to interviewers is 25 to 50 percent higher in the incubator, allowing interviewers to more readily ask questions of supervisors and receive constructive individualized feedback. Time spent in the incubator is considered part of each new interviewer's initial training.

### 4.3.2.2 NATS-SpeCIFIC TRAINING

Each NATS interviewer was specifically selected from ICF's pool of skilled call center personnel. They were assessed on their ability to productively collect accurate data while maintaining rapport with respondents. Interviewers were required to demonstrate effective handling related to: reading verbatim, scheduling re-contact attempts at optimum times, properly following procedures, and knowing how and when to use non-leading probes.

ICF also carefully selected the training staff for NATS interviewers. Trainings were led by a project manager or a senior supervisor with extensive experience on identical or similar projects.

NATS-specific training topics included:

- Survey background and context, including survey purpose and scope;
- Overview of survey population, sample, and sample design;
- Dialing protocol, response rates, and achieving high response;
- Review of survey characteristics, such as the expected survey length, methodology, use of caller ID and IVR information;
- Review of the questionnaires, including topics covered by the survey with a focus on challenging and unique questions, differences between landline and cell phone questionnaire instruments, and the purpose/context of key questions;
- Review of the FAQ document and how to respond to common respondent questions; and
- Discussion of refusal protocol, as well as refusal aversion and conversion techniques.

Prior to dialing on the NATS, interviewers conducted mock interviews using the CATI system to gain experience with NATS questionnaire flow, data entry mechanics, and terminology. A short quiz was administered at the end of the training. If an interviewer produced a low quiz score, he or she was required to go through additional training until adequately prepared for his or her first calls.

### 4.3.2.3 ONGOING TRAINING

Interviewers participated in Interviewer Enhancement Courses (IEC) monthly. IEC topics included how to navigate gatekeepers, refusal aversion, and topics specific to NATS performance such as refusal conversion for cell phones, and neutral probes. In addition, ICF's quality assurance (QA) staff and project management staff evaluated all interviewers on the project via monitoring sessions. Such monitoring sessions included both past interviews that had been recorded and live interviews in-progress. QA staff and call center supervisors coached interviewers individually based on feedback from the monitoring sessions. If, after coaching, an interviewer's performance did not improve, he or she was removed from working on the study.

### 4.4 Fielding Protocol

Fielding protocols were developed based on the Behavioral Risk Factor Surveillance Survey (BRFSS) survey, and adapted for NATS. BRFSS protocol stipulates that each landline record in the sample must receive a terminal disposition or at least 15 attempts (six attempts for cell phones) before calls to the number are ceased. Landline and cell phone sample follow slightly different protocols, to account for user differences. For example, cell phone users tend to carry their phones with them; thus, fewer (6) attempts are recommended on cell phone sample.

There are three day-part calling occasions: Monday through Friday (9am-5pm), Monday through Friday (5pm-9pm), and Saturday and Sunday (9am-9pm).

Landline dialing protocol and day-part attempts were allocated as follows:

- Weekdays: Monday through Friday: 9:00 am - 5:00 pm: three attempts.
- Weeknights: Monday through Friday: 5:00 pm - 9:00 pm: three attempts.
- Weekends: Saturday and Sunday: 9:00 am - 9:00 pm: three attempts.
- Six additional attempts during evening or weekend.
- If a live respondent was reached for the first time at the $12^{\text {th }}$ to $15^{\text {th }}$ attempt, up to four additional evening or weekend attempts were made after the live respondent was reached.

At the beginning of the 2013-2014 NATS, the cell phone dialing protocol and day-part attempts were designed to spread attempts equally across all day-parts. In an attempt to improve cell phone response rates, ICF modified the dialing protocol in July to make more calls during times proven to be the most productive during the first nine months of fielding, as follows:

- Weekdays: Monday through Friday: 9:00 am - 5:00 pm: three attempts.
- Weeknights: Monday through Friday: 5:00 pm -9:00 pm: two attempts.
- Weekends: Saturday and Sunday: 9:00 am - 9:00 pm: one attempt.
- If a live respondent was reached for the first time on the sixth attempt, up to three additional attempts were made after the live respondent was reached.

Attempts were made until a final disposition was obtained. A final disposition was attained when:

- The respondent completed the interview;
- The telephone number was found to be invalid;
- The record reached 15 attempts for landline sample or six attempts for cell phone sample; or
- The respondent gave a final refusal.


### 4.4.1 Contacting Respondents

Interviewers followed similar protocols for landline and cell phone interviews when contacting households and potential respondents. The protocols are described below, with those unique to landline and cell phone indicated.

### 4.4.1.1 Treatment of No Answers

If a call to a sampled telephone number was not answered, the number was repeatedly called at different times, during the three defined day-parts, 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 (landline) or six (cell) contact
attempts, over a minimum five-day period (typically 30 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 selected adult, or confirmed adult in the case of cell phone surveys.

### 4.4.1.2 Rings Per Attempt

The telephone rang a minimum of five times on each attempt made on a record.

### 4.4.1.3 BUSY LINES

Busy lines were called back at least twice at 20-minute intervals. If the line was still busy after the third attempt, the number was assigned a "busy" disposition and called during the next available shift. For example, if a "busy" disposition was assigned during a Monday through Friday 9am-5pm day-shift, the record was queued by the CATI system for dialing for that weekday evening-shift ( $5 \mathrm{pm}-9 \mathrm{pm}$ ).

### 4.4.1.4 Respondent Selection

Once a household was contacted, an adult was selected for study participation. In the landline study, the questionnaire screener asked for the number of adults in the household, then how many of the adults were men, and how many were women. One adult then was randomly selected for participation by the CATI program. If the selected adult was the person already on the phone, the interviewer proceeded with informed consent and began the interview. If the selected respondent was not the person on the phone, the interviewer asked to speak to the selected respondent.

The cell phone study did not involve a random selection of adults; cell phone respondents were screened for adult status prior to beginning the interview. No interviews were allowed by proxy on either the landline or cell phone studies. If the landline or cell phone respondent could not or would not participate, the record was assigned a final disposition and taken out of dialing.

No interview was conducted if:

1) The adult was:

- Unavailable during the survey period;
- Unable or unwilling to participate; or
- Did not speak English or Spanish well enough to be interviewed.

2) A randomly sampled number yielded:

- A business;
- An institution;
- Group quarters; or
- Other strictly non-residential space.


### 4.4.1.5 INFORMED CONSENT

Once the interviewer verified that he or she was speaking with the selected respondent, he or she read the following informed consent statement to the respondent:

You don't have to answer any question you don't want to, and you can end the interview at any time. I won't ask for your last name, address, or other personal information that can identify you. Any information you give me will be maintained in a secure manner.

If you have any questions about this survey, I will provide a telephone number for you to call to get more information. [IF NEEDED: 1-877-386-6789] (If a respondent dialed this number, he or she was routed to the IVR system and offered the menu options described in section 4.2.2)

This call may be monitored or recorded for quality assurance.
(IF ASKED): The interview takes about 15 to 25 minutes to complete, depending on your situation.
(IF ASKED): There are no known risks to you for taking part in this interview. There are no direct benefits to you for taking part in this interview, but your answers are important and will help the CDC better understand health issues and plan health programs. Your answers will be maintained in a secure manner. Any information that might identify you, such as your telephone number, will never be linked to your answers and will not appear in any written reports or publications.

After reading the informed consent, the interview continued, unless the respondent expressed unwillingness to participate.

### 4.4.1.6 Language of Interviewing

NATS interviewers administered the survey in English and Spanish. The landline sample was sent to Marketing Systems Group (MSG) for Hispanic surname flagging. Records with an address associated with them, and that had a potential Hispanic surname identified, were flagged as such. Interviewers who spoke both English and Spanish dialed landline records with a Hispanic surname flag and interviews were conducted in the respondent's preferred language. Cell phone records, and landline records that did not have a Hispanic surname flag were dialed by an interviewer who spoke English. If the respondent was unable to complete the interview in English, and preferred a Spanish-speaking interviewer, the call was either transferred to a Spanish-speaking interviewer (if available at the time), or a Spanish-speaking interviewer called the respondent back.

### 4.4.1.7 Answering Machines and Privacy Managers

Interviewers were prompted to leave answering machine messages on the first, fourth, and ninth times a landline record reached an answering machine. Privacy managers were handled the same way as answering machines. When an interviewer reached a privacy manager on the first, fourth, or ninth attempt that reached a privacy manager, they were prompted to leave a name or message on the privacy manager and attempt to get through to a respondent. On other attempts that resulted in privacy managers, the interviewer ended the call and gave the record a privacy manager disposition without attempting to get through to a respondent. For cell phone records, messages were left on the first and fourth attempt that reached an answering machine.

### 4.4.1.8 Refusal protocol

The NATS landline refusal protocol required two refusals by a selected respondent, or three refusals by a non-selected respondent, to terminate the record from calling. Once a household or individual initially refused participation, specially trained refusal conversion interviewers made contact a minimum of three days later, to encourage survey participation.

From October, 2013 through June, 2014 if a respondent in the cell phone sample refused to participate in the survey once, the record was taken out of dialing and given a terminal refusal disposition. Starting in July, 2014, the cell phone refusal protocol required two refusals to terminate the record from calling.

### 4.4.1.9 Cell Phone Respondent Safety

Cell phone respondents were screened that our call on their cell phone would not compromise their safety (e.g. by driving and talking on the phone). While a safety question appears in the cell phone survey screener, interviewers were trained to schedule a call-back if a respondent indicated at any time during the call that he or she was driving or doing something that would make it unsafe to stay on the phone.

## 5. Quality Control and Assurance Measures

### 5.1 Advance Letter Quality Control

ICF implemented quality control (QC) measures to guarantee a quality mailing effort. First, project staff reviewed proofs of mailing materials, more specifically, the advance letter and the outer envelope. Once the letters were printed and placed in the envelopes, project staff reviewed the contents of the mailing for more than-ten percent of the sample to ensure that the letters were correct and that all of the information successfully merged onto the letter and the envelopes. Additionally, ICF staff verified that the envelopes were stamped with first-class pre-sort postage, sealed, and had the official CDC logo printed on them once the proofs are approved for printing. More than ten-percent of the sample was quality checked at this state. On inserting the mail materials more than fifty-percent was verified for quality control and assurance.

### 5.2 Telephone Data Collection Quality Control

ICF followed stringent QA steps to ensure the instrument, interview quality, and data processing met client expectations. Table 5-1 outlines the QC measures ICF employed in an effort to eliminate errors and standardize procedures.

## Table 5-1. ICF Quality Control Measures

| TASK | Telephone Data Collection Quality Control Measures |
| :---: | :---: |
| CATI Program Testing | - Tested each response to each question, and each path through the survey <br> - Reviewed frequencies from randomly-generated data to ensure that the program was organizing data properly and recording values according to the survey specification <br> - Developed skip-check program to check data against defined conditions specified in the Microsoft Word version of the questionnaire <br> - Provided the client with an electronic test version of the programmed survey |
| CATI Pre-test <br> Interviewer <br> Training | - Pre-test of nine interviews <br> - Dedicated team of NATS interviewers <br> - General two day training <br> - NATS-specific training led by ICF project management, subsequent trainings led by call center supervisory staff |
| CATI Quality Assurance (QA) | - Call center monitored at least 10 percent of all interviews ( $10 \%$ sample) <br> - Professional project staff monitored NATS interviewing weekly <br> - Assigned supervisors to manage a team of no more than 10 interviewers <br> - Reviewed call center shift reports and internal project tracking reports daily <br> - Reviewed data alerts indicating issues and fixing any issues immediately |


| TASK | Telephone Data Collection Quality Control Measures |
| :--- | :--- |
| Preparation of | - $\quad$ Cleaned and back-coded open-ended responses |
| Data Files | - Assigned a final disposition to each record |
|  | -Produced frequency tabulations of every question and variable to detect <br>  <br>  <br> TASK <br> Weighting |
| - Independent review of the weighting code by a second sampling statistician |  |
|  | - Checked range and values of adjustments; evaluated selection probabilities |
|  | - Independent review of definitions of variables used in weighting |

### 5.2.1 Monitoring

The QA monitoring team for the 2013-2014 NATS included the project manager, data collection manager, and call center supervisors and QA assistants. Interviewer monitoring was primarily conducted by QA assistants. QA assistants monitored interviews by tapping into interviewers' telephone lines and using the CATI system's monitoring module to follow the course of the interview on a computer screen. Further, ICF kept a database of all recorded CATI calls occurring during the prior 10 days of fielding. The database housed the majority of attempts, which included everything from completed interviews and introductions, to no-answers (e.g. answering machines, privacy managers). Recorded interviews allowed for additional monitoring and QA tasks.

Interviewers were evaluated on their telephone manner and rapport with the respondents. More specifically, interviewers were assessed on reading the questions verbatim, listening to the comments and questions of respondents and providing accurate probes when necessary, correctly recording the information, and gaining respondent cooperation. Monitoring sessions were rated on a scale from one to 100. The average monitoring score for the 2013-2014 NATS was 96 . In all, 263 interviewers were trained and conducted the survey. To further guarantee QC, supervisors were assigned to a maximum of 10 interviewers. Additionally, ICF reviewed call center shift reports and internal project tracking reports daily.

## 6. Outcome Results

There were 52,594 completed surveys in the landline sample and 22,639 completed surveys in the cell sample. Final dispositions were categorized using AAPOR's standard Definitions ${ }^{1}$. A description of the final dispositions and calling rules appears in Appendix A.

Table 6-1 gives the total number of completes, the count of landline completes, count of cell completes, and the response rate for both landline and cell samples using AAPOR RR4 from the AAPOR Standard Definitions. ${ }^{1}$ The AAPOR RR4 was calculated using the following formula.

```
(I+P)/((1+P)+(R+NC+O)+e(UH+UO))
I = Complete interview (1.1);
P = Partial interview (1.2);
R = Refusal and break-off (2.10);
NC = Non-contact (2.20);
O = Other (2.30);
UH = Unknown if household/occupied HU (3.10);
UO = Unknown, other (3.20, 3.30, 3.40, 3.90); and
e = Estimated proportion of cases of unknown eligibility that are eligible.
```

Table 6-1. Landline and Cell Phone Completes: Overall and by State

| State | Total <br> Completes | Landline <br> Completes | Cell <br> Completes | Total <br> Response <br> Rate <br> (AAPOR 4) | Landline <br> Response <br> Rate <br> (AAPOR 4) | Cell <br> Response <br> Rate <br> (AAPOR 4) |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: |
| Total | 75,233 | 52,594 | 22,639 | 36.1 | 47.6 | 17.1 |
| Alabama | 1,005 | 704 | 301 | 37.3 | 48.2 | 20.1 |
| Alaska | 1,001 | 701 | 300 | 45.3 | 51.0 | 33.9 |
| Arizona | 1,283 | 898 | 385 | 37.7 | 47.3 | 16.8 |
| Arkansas | 998 | 697 | 301 | 42.5 | 52.1 | 23.1 |
| California | 6,998 | 4,891 | 2,107 | 32.4 | 43.1 | 14.0 |
| Colorado | 1,006 | 700 | 306 | 41.2 | 51.2 | 19.7 |
| Connecticut | 999 | 697 | 302 | 28.0 | 44.8 | 11.2 |
| Delaware | 1,020 | 722 | 298 | 31.0 | 43.6 | 14.4 |
| District of Columbia | 993 | 695 | 298 | 38.2 | 52.5 | 13.4 |
| Florida | 3,535 | 2,480 | 1,055 | 35.9 | 47.5 | 15.9 |
| Georgia | 1,868 | 1,295 | 573 | 40.1 | 49.2 | 20.6 |
|  |  |  |  |  |  |  |

[^0]$\left.\begin{array}{|lcccccc|}\hline \text { State } & \begin{array}{l}\text { Total } \\ \text { Completes }\end{array} & \begin{array}{l}\text { Landline } \\ \text { Completes }\end{array} & \begin{array}{l}\text { Cell } \\ \text { Completes }\end{array} & \begin{array}{l}\text { Total } \\ \text { Response } \\ \text { Rate }\end{array} & \begin{array}{l}\text { Landline } \\ \text { Response } \\ \text { Rate }\end{array} & \begin{array}{l}\text { Cell } \\ \text { Response } \\ \text { Rate }\end{array} \\ \text { (AAPOR 4) } \\ \text { (AAPOR 4) }\end{array}\right]$
${ }^{2}$ This represents an adjusted rate. The original rate was $17.8 \%$. It was determined that ICF's dialer may not have identified nonworking numbers accurately in Rhode Island, maybe due to the type of tone that the telephone company used. ICF sent records from July, August, and September sample months to Marketing Systems Groups for screening. About 60\% of the records originally classified as no-answer were classified as nonworking/nonproductive by MSG. The adjusted rate was calculated by changing 60\% of the records dispositioned as "no-answer" to "nonworking".

Completes totaled 75,233 . Of these, 52,594 were from the landline sample and 22,639 came from the cell phone sample. The overall response rate (AAPOR 4) was 36.1 percent. The landline response rate was 47.6 percent, and the cell phone rate was 17.1 percent.

Table 6-2 shows the frequency of AAPOR result codes by sample frame.

Table 6-2. AAPOR Result Codes

| AAPOR Code | AAPOR Result | Landline | Cell | Total |
| :--- | :--- | :--- | :--- | :--- |
| 1.1 | Complete | 49,610 | 20,877 | 70,487 |
| $\mathbf{1 . 2}$ | Partial complete | 2,984 | 1,762 | 4,746 |
| $\mathbf{2 . 1}$ | Break-off/termination within questionnaire | 3,887 | 2,950 | 6,837 |
| $\mathbf{2 . 1 1 1}$ | Household-level refusal | 12,157 | 448 | 12,605 |
| $\mathbf{2 . 1 1 2}$ | Known respondent refusal | 3,895 | 7,573 | 11,468 |
| $\mathbf{2 . 2 1}$ | Selected respondent never available | 8,317 | 5,693 | 14,010 |
| $\mathbf{2 . 3 2}$ | Selected has impairment | 1,722 | 44 | 1,766 |
| $\mathbf{2 . 3 3 2}$ | Selected has language barrier | 515 | 326 | 841 |
| $\mathbf{3 . 1}$ | Unknown if housing unit | 115,663 | 234,432 | 350,095 |
| $\mathbf{3 . 1 2}$ | Always busy | 20,121 | 12,275 | 32,396 |
| $\mathbf{3 . 1 3}$ | No answer | 74,525 | 56,719 | 131,244 |
| $\mathbf{3 . 1 4}$ | Answering machine, unknown if household | 37,718 | 101,121 | 138,839 |
| $\mathbf{3 . 1 5}$ | Telecomm barrier (Call block) | 546 | 329 | 875 |
| $\mathbf{3 . 2}$ | Household, unknown if eligible | 13,314 | 9674 | 22,988 |
| $\mathbf{4 . 1}$ | Reached wrong geographic location | 133 | 163 | 296 |
| $\mathbf{4 . 2}$ | Dedicated fax/data/modem line | 38,485 | 589 | 39,074 |
| $\mathbf{4 . 3}$ | Non-working | 610,610 | 77,164 | 687,774 |
| $\mathbf{4 . 4 2}$ | Cell (on landline study) | 1,108 | 0 | 1,108 |
| $\mathbf{4 . 4 3}$ | Call forwarding | 1,040 | 7,140 | 8,180 |
| $\mathbf{4 . 4 4}$ | Pagers | 35 | 22 | 57 |
| $\mathbf{4 . 4 5}$ | Cell with landline (on cell study) | 0 | 20,610 | 20,610 |
| $\mathbf{4 . 4 6}$ | Landline (on cell study) | 0 | 940 | 940 |
| $\mathbf{4 . 5}$ | Non-residence | 59,207 | 18,983 | 78,190 |
| $\mathbf{4 . 5 3}$ | Group home | 1,151 | 85 | 1,236 |
| $\mathbf{4 . 7}$ | Household, no eligible respondent | 309 | 12,068 | 12,377 |
| Total |  | $1,057,052$ | 591,987 | $1,649,039$ |

Table 6-3 gives the overall AAPOR refusal rates, cooperation rates, and contact rates for the landline and cell samples using AAPOR's standard definitions ${ }^{1}$. ICF also used AAPOR's definitions for the refusal, cooperation, and contact rates (Table 6-4).

The refusal rates generally consist of "the proportion of all cases in which a housing unit or the respondent refuses to be interviewed, or breaks-off an interview, of all potentially eligible cases". The cooperation rates generally consist of "the proportion of all cases interviewed of all eligible units ever contacted". The contact rates generally consist of "the proportion of all cases in which some responsible housing unit member was reached".

Table 6-3. NATS Overall AAPOR Refusal, Cooperation, and Contact Rates by Sample Type
Total Landline Cell

| N | $1,649,039$ | $1,057,052$ | 591,987 |
| :--- | :--- | :--- | :--- |
| AAPOR Refusal Rate 1 | 3.9 | 5.8 | 2.4 |
| AAPOR Refusal Rate 2 | 14.9 | 18.1 | 8.3 |
| AAPOR Refusal Rate 3 | 25.2 | 24.0 | 27.7 |
| AAPOR Cooperation Rate 1 | 64.8 | 66.4 | 61.4 |
| AAPOR Cooperation Rate 2 | 69.2 | 70.3 | 66.6 |
| AAPOR Cooperation Rate 3 | 66.4 | 68.4 | 62.1 |
| AAPOR Cooperation Rate 4 | 70.9 | 72.5 | 67.4 |
| AAPOR Contact Rate 1 | 13.6 | 21.7 | 7.5 |
| AAPOR Contact Rate 2 | 52.2 | 67.7 | 25.7 |
| AAPOR Contact Rate 3 | 88.6 | 90.0 | 85.7 |

Table 6-4. AAPOR Refusal, Cooperation, and Contact Rate Definitions

```
Cooperation Rate 1
I/(I+P)+R+O)
Cooperation Rate 2
\((1+P) /((1+P)+R+0))\)
Cooperation Rate 3
I/((I+P)+R))
Cooperation Rate 4
\((1+P) /((1+P)+R))\)
Refusal Rate 1
\(\mathrm{R} /((\mathrm{I}+\mathrm{P})+(\mathrm{R}+\mathrm{NC}+\mathrm{O})+\mathrm{UH}+\mathrm{UO}))\)
Refusal Rate 2
\(R /((I+P)+(R+N C+O)+e(U H+U O))\)
Refusal Rate 3
\(\mathrm{R} /((1+\mathrm{P})+(\mathrm{R}+\mathrm{NC}+\mathrm{O}))\)
Contact Rate 1
\((1+P)+\mathrm{R}+\mathrm{O} /(1+\mathrm{P})+\mathrm{R}+\mathrm{O}+\mathrm{NC}+(\mathrm{UH}+\mathrm{UO})\)
Contact Rate 2
I+P)+R+O / (I+P)+R+O+NC +e(UH+UO)
Contact Rate 3
( \(1+\mathrm{P}\) ) \(+\mathrm{R}+\mathrm{O} /(1+\mathrm{P})+\mathrm{R}+\mathrm{O}+\mathrm{NC}\)
```

Computed contact rates vary widely depending on the definition used. Contact Rate 1 assumes that all non-contacted numbers were potentially eligible households or cell respondents while Contact Rate 3 assumes that almost all of these uncontacted numbers were ineligible. These formulas represent the extremes, whereas the assumption of Contact Rate 2 is that some percentage of these numbers was eligible.

### 6.1 Efforts to Boost Response Rates for the Cell Phone Sample

The response rate, as calculated by AAPOR RR4, was lower than expected for the cell phone sample (17.1\%). Cell phone numbers were screened for activity status using MSG's CellWINS service and working numbers were over-sampled. Over-sampling working numbers negatively impacts the AAPOR RR4 response rates because the percent of ineligible records decreases. ICF calculated an adjusted rate to account for the difference in sampling. The adjusted rate was calculated by weighting the inactive numbers by the same rate that was used for oversampling the active numbers. The adjusted AAPOR RR4 for cell phone sample was 22.4 percent, a 5.3 percent increase.

ICF implemented the following changes to improve response rates for the cell phone sample. More details on the changes to calling protocol can be found in section 4.4 Fielding Protocol.

- Employing refusal conversion (See section 4.4.1.8 Refusal Protocol);
- Adding three additional calling attempts on records where a previous contact was made;
- Focusing calls during the most productive times (See section 4.4 Fielding Protocol); and
- Utilizing only the best-producing interviewers on the cell phone study, and enhanced monitoring and coaching for these interviewers.


## 7. Data Processing

Data processing is comprised of three functions: converting the raw data into a user-friendly SAS data file, finalizing each record's disposition, and performing a quality review of the data. This section explains how each function is accomplished.

The first step in data processing was to convert the raw data into a second, user-friendly SAS data file. Spelling or typographical errors in "other-specify" responses were corrected, and recoded if necessary. Next, incomplete interviews were identified and final dispositions were assigned to all records.

After converting and cleaning the data, frequency tabulations of every question and variable are produced to detect missing data or errors in skip patterns. A variety of other checks were performed in SAS programs. For each question, any remaining responses outside of the expected range were flagged and the program re-assigned response values according to specified requirements.

Cumulative datasets were delivered monthly throughout data collection. At the end of the 12 -month fielding period, two separate files were created. The master file contained all variables and all records, and the analytic dataset only contained completed and partially completed records. The analytic dataset excluded non-essential variables, such as responses to verification questions and variables provided with the sample. A codebook of the analytic file can be found in Appendix D. Both files contained calculated variables, and matched the 2012-2013 dataset where possible..

Before each dataset was delivered, the data was checked by an automatic program that confirmed that the skip logic was correct for all records. ICF also reviewed the contents of the file and a frequency distribution of all survey questions and computed variables.

## 8. Weighting Process

The weighting for NATS served several important purposes:

- Corrected for unequal probabilities of selection into the survey sample, including from the dual-frame sample;
- Corrected for differential non-response among elements of the survey population;
- Corrected for frame undercoverage due to households with no phone;
- Corrected for differences in demographic characteristics of the sample versus the population; and
- Reduced sampling variability.

The NATS weighting was a multi-stage process. For consistency with the 2012-2013 NATS survey, the same weighting steps were followed, with adaptations to reflect differences in the sampling methods. The steps were:

1. Calculate initial weights;
2. Adjust for unknown eligibility status and non-response;
3. Adjust for within household selection and multiple telephones;
4. Rake to known population totals; and
5. Trim weights.

### 8.1 Calculate Initial Weights

The first stage in weighting involved creating sampling weights that correct for disproportionate probabilities of selection, called initial weights. The initial weight is the inverse of the probability that the particular unit is drawn into the sample. The base weights are presented in Appendix D.

Landline-For each stratum, the selection probability is the number of phone number selected ( $n$ ) divided by the number of phone numbers in the stratum ( $N$ ).

$$
\begin{aligned}
& P r_{i}=n_{i} / N_{i}, \text { where } \\
& n_{i}=\text { total phone numbers selected from density stratum i } \\
& N_{i}=\text { total phone numbers on the frame in density stratum } \mathrm{i} .
\end{aligned}
$$

The initial weight for the jth sample member in stratum i is the inverse of the selection probability, $W 1_{i, j}=1 / P r_{i,}=N_{i} / n_{i}$.

There are 102 total strata based on 51 states (including DC) by two density strata, listed telephone numbers (high-densityi=1), and unlisted telephone numbers (low-densityj=2). Since the sample is draw monthly and the frame is update quarterly, we used the average frame value.

Cell phone-Cell phone was based on a two-phase sample:

1) Select a sample of phone numbers ( $n$ ) from each state stratum ( $N$ ); using CellWINS outcome, substratify the selected phone numbers as 1 ) active (high-density, $\mathrm{i}=1$ ) or 2 ) non-active (lowdensity, $\mathrm{i}=2)^{3}{ }^{3}$
2) Select a subsample ( $n^{*}$ ) from each density stratum: take all phone numbers in the working stratum; take 1-in-3.6 subsample of phone numbers from the non-working stratum.

The two-phase probability of selection is

$$
\begin{aligned}
& \operatorname{Pr} r_{i}=n / N \times n_{i}^{*} / n_{i}, \text { where } \\
& n=\text { total phone numbers selected (state sample size) } \\
& N=\text { total phone numbers on frame } \\
& n_{i}=\text { sampled telephone numbers in density stratum i } \\
& n_{i}^{*}=\text { second phase sample size selected for density stratum i. }
\end{aligned}
$$

The initial weight for the jth sample member in stratum i is the inverse of the selection probability, $W_{i, j}^{1}=$ $1 / P r_{i}=\left(N \times n_{i} / n\right) / n_{i}^{*}$, where $N \times n_{i} / n$ is the estimated number of cell phone numbers on the frame in each density stratum. There are 102 total strata based on 51 states (including DC) by two density strata. Since the sample is draw monthly and the frame is update quarterly, we used the average frame value.

### 8.2 Adjust for Unknown Eligibility Status and Non-response

The non-response adjustment for landline and cell was a two-step process. First, there was an adjustment for unknown eligibility status and then a second adjustment for weights for survey non-response.

### 8.2.1 Adjust for Unknown Eligibility Status

The outcome (disposition) of a telephone number falls into one of three categories: eligible ( $n_{i}^{e}$ ), ineligible $\left(n_{i}^{\chi}\right)$, and unknown eligibility $\left(n_{i}^{u}\right)$. Unknown eligibility is a form of non-response, occurring when no contact is made with a telephone number, but it appears to be a working number (e.g. answering machine, ring no answer) or contact is made, but the survey does not progress far enough to determine that eligibility for the survey (e.g. refusal during screening.) As was done in NATS 2012-2013, the sampling weights were adjusted for the unknown phone numbers based on the observed eligibility rates, $W 1_{i, j}=$ $U_{i} \times 1 / P r_{i}$, where $U_{i}=n_{i}^{e} /\left(n_{i}^{e}+n_{i}^{x}\right)$.

### 8.2.2 Adjust Weights for Survey Non-response

The steps for calculating the non-response adjustment differed for cell and landline. The landline adjustment used auxiliary data available for geographies associated with the landline telephone number to develop a response propensity model. However, geographic auxiliary information was not available for the cell phone sample. Therefore, a simple ratio adjustment was used to account for non-response.

Landline-The non-response adjustment for landline included four steps:

[^1]1. Append auxiliary data to frame;
2. Fit a logistic regression model to estimate the response propensity based on the auxiliary data;
3. Adjust the weights for non-response by dividing by the response propensity; and
4. Ratio-adjust the weights so they sum to the sampling weights.

### 8.2.2.1 Step 1. Append auxiliary data to frame

The auxiliary data was based on environmental characteristics similar to those used in NATS 2012-2013. The characteristics were computed from the 2008-2012 5-year American Community Survey Summary Files. The characteristics were based on census block group for high-density stratum (listed); and on county for the low-density stratum (unlisted). Listed numbers that could not be geocoded to a census block group were included with the unlisted numbers for the modeling.

- Population count,
- Household count,
- Proportion black or African American,
- Proportion Hispanic,
- Proportion rural,
- Median age,
- Adults per household,
- Children per household,
- Proportion of occupied households,
- Proportion of occupied households with a mortgage,
- Proportion of population with less than a high school degree,
- Proportion of population with a college degree or higher,
- Proportion of the population that lived in the same house one year ago, ${ }^{4}$
- Proportion never married, and
- Proportion now married.


### 8.2.2.2 STEP 2. FIT LOGISTIC REGRESSION MODEL

Using the auxiliary data from step 1, the probability of response based on a logistic regression model was estimated:
$\operatorname{Pr}\left(r_{j} \mid \boldsymbol{X}_{\boldsymbol{j}}\right)=\frac{1}{1+e^{-\boldsymbol{\beta} \boldsymbol{X}_{\boldsymbol{j}}}}$
where $r_{j}$ indicates response ( $1=$ yes, $0=\mathrm{no}$ ) and $\boldsymbol{X}_{j}$ is a series of independent variables for individual j . Backwards selection was used-removing one variable at a time until all variables have a $p$-value of 0.05 or less. A separate model was utilized for the 102 combinations of state and density stratum.

### 8.2.2.3 STEP 3. AdJust Weights for non-Response

${ }^{4}$ The proportion of the population that lived in the same house one year ago was not available down to the block group level. Therefore we substituted the tract level percentage for the high density stratum model.

The non-response adjusted weights were calculated as the initial weight divided by the modeled response propensities, $W 2_{i, j}=W 1_{i, j} / \hat{p}_{i, j}$, where $\hat{p}_{i, j}$ is the estimated response propensity for individual j . The non-response adjustment was applied to the respondents.

### 8.2.2.4 Step 4. Ratio adjust the weights

Finally, the non-response adjusted weights were adjusted so that the sum equals the unknown eligibility adjusted weights for respondents, non-respondents, and unknowns, $W 3_{i, j}=W 2_{i, j} \times$
$\sum W 1_{i, j} / \sum W 2_{i, j}$.
Cell Phone—The modeling as described above was not feasible for cell phone since county is not known for the cell phone sample. Therefore, for each area code, the respondents ( $r$ ) were weighted to represent the estimated eligible sample. The estimated eligible sample included confirmed eligible (e; respondents and non-respondents) and the unresolved adjusted for eligibility (u):
$W 3_{i, j}=W 1_{i, j} \times \sum_{e, u} W 1_{i, j} / \sum_{r} W 1_{i, j}$.

### 8.3 Adjust for Within-household Selection and Multiple Telephones

The landline sample used a two-stage selection process. First, the household was selected with probability proportional to the number of landline telephones in the household. Second, one respondent was randomly selected from all eligible household members. Therefore, the weights were adjusted to account for multiple telephones and the within-household selection:
$W 4_{i, j}=W 3_{i, j} \times a_{i, j} / l_{i, j}$,
where $a_{i, j}$ is the number of adults and $l_{i, j}$ is the number of landlines in the $j^{\text {th }}$ respondent household. In cases where a household reported more than three telephone lines, the adjustment factor was set to three (i.e., it is truncated to limit the potential variance-inflating effects of extreme weights).

The cell sample used a one-stage selection process since cell phones are generally considered a personal device. This was reflected in the sampling methodology where the person who answered the cell phone was sampled. Thus, a respondent was not randomly selected nor adjusted for multiple household phones. Therefore $W 4_{i, j}=W 3_{i, j}$.

### 8.4 Weight Trimming

Prior to evaluating the weights for weight trimming, we ratio adjusted the weights to match the national percentage of adults living in cell-only and landline households. To calculate this percentage, we used modeled state estimates from the 2013 National Health Interview Survey ${ }^{5}$ and the 2013 adult population living in households for each state from the 2013 1-year Public Use Microdata Sample (PUMS) files. ${ }^{6}$

|  | Before dual-frame adjusmtent | After dual-frame adjustment |
| :--- | :---: | :---: |
| Cell phone only | $60.1 \%$ | $39.6 \%$ |
| Landline | $39.9 \%$ | $60.4 \%$ |

We evaluated each state for weight trimming in two steps:

1) First we evaluated weights for respondents whose reported state (Q96) was different from the state in which they were sampled. We trimmed weights exceeding 1.5 times the maximum weight for the sample state. This resulted in 86 trimmed weights across nine states.
2) If the unequal weighting effect (UWE) (see below) still exceeded 2.0 , we trimmed weights exceeded Q3+3*IQR, where Q3 is the third quartile and IQR is the interquartile range, IQR = Q3Q1. This resulted in 36 weights trimmed in DC.

The weight trimming is summarized in Appendix $E$.

### 8.4.1 Unequal Weighting Effect

The UWE is an upper bound of the ratio of the variance of an estimate calculated from a survey to the variance one would obtain from a simple random sample with the same sample size. The concept of UWE is described by Biemer and Christ in the International Handbook of Survey Methodology (2008): ${ }^{7}$
"Kish (1965, p.427) derived a formula for determining the maximum increase in variance of an estimate of a population mean due to a weight variation. ${ }^{8}$ His formula assumes there is no correlation between the survey weights and the characteristic whose mean is to be estimated. This may be a good approximation for many survey variables because the survey design and weight adjustments are optimized for only a few key characteristics out of hundreds that may be collected in a survey. The actual variance increase will vary across characteristics in the survey and will be smaller for characteristics where the covariance between the observations and the weights are larger. Under these assumptions, Kish obtained the following expression for the UWE defined as the ratio of the variances of the weighted mean to the variance of the unweighted mean:

$$
\mathrm{UWE}=1+c v^{2}
$$

[^2]"Where $c v$ is the coefficient of variance of the weights or the sample standard deviation of the weights divided by the sample average weight."

The UWE does not take into account the effect of the stratification on the estimates. Stratification usually reduces variance. Appendix E contains the UWE before and after trimming for each state.

### 8.5 Rake to Known Population Totals

The raking ensured that the survey sample matched the population in each state by demographics such as age, gender, education, marital status, and race. In most telephone surveys, different population subgroups responded at different rates. For example, females are more likely to respond than males resulting in a distribution of $43 \%$ male and $57 \%$ female. The Raking will adjust the weights to match the population distribution of $48 \%$ male and $52 \%$ female. Raking iteratively adjusts the sample to match the population along a number of demographic and socioeconomic dimensions. To the extent that the raking dimensions were correlated with the survey data, these weighting adjustments mitigated bias due to survey nonresponse and frame coverage.

The raking was conducted for each state with these dimensions:

- Age (18-24, 25-34, 35-44, 45-54, 55-64, 65-74, 75+ years) by gender;
- Race (Hispanic, non-Hispanic white, non-Hispanic black or African American, non-Hispanic other/multi);
- Marital status (married, never married, widowed/divorced/separated) by gender;
- Educational attainment (less than high school, high school graduate, some college/technical school, college graduate, post graduate degree) by gender;
- Phone category (landline, cell-only); and
- House type (single, detached or other; single, attached; multi, 2 unit; multi, 3-9; multi,10-49; multi, 50+, mobile home, boat, RV, or van.)

The population controls were computed from the 2013 1-year American Community Survey's Public Use Microdata Sample (PUMS) files. ${ }^{9}$ Group quarters records were removed from the PUMS files so the file represents the adult household population in each state. The population for phone status was calculated by multiplying the total adult population in each state by the adult phone usage percentages based on modeled state estimates from the 2013 National Health Interview Survey. ${ }^{10}$ The phone usage percentages were adjusted to $100 \%$ after excluding the "no telephone service" category. The population controls are presented in Appendix E, Tables E-2 through E-8.

[^3]
### 8.5.1 Collapsing Rules

The categories for the raking were collapsed if the sample size for any given cell was small. We collapsed for housing type, age group by gender, and race/ethnicity. The cell sizes for the remaining dimensions did not require collapsing.

For age group by gender, we collapsed a cell if the sample size was less than 50 or the percentage was less than $2.5 \%$. The collapsing rule was as follows:

1) 18-24: Collapse with $25-34$
2) 25-34: Collapse with $35-44$
3) $35-44$ : Collapse with $45-54$
4) 45-54: Collapse priority 1) 35-44 2) 55-64
5) 55-64: Collapse with 45-54
6) 65-74: Collapse with $75+$
7) $75+$ : Collapse with 65-74

For race, we collapsed a cell if the sample size was less than 50 or the percentage was less than $2.5 \%$. The collapsing rule was as follows:

1) Hispanic: Collapse with Non-Hispanic other
2) Non-Hispanic black: Collapse with Non-Hispanic other
3) Non-Hispanic other: Collapse with Non-Hispanic white

For housing type, we collapsed a cell if the sample size was less than 80 or the percentage was less than $3 \%$. The collapsing rule was as follows:

1) Single unit, attached: Collapse with Single unit, detached or other
2) Multi, 2 units: Collapse with Multi, 3-9 units
3) Multi, 3-9 units: Collapse priority 1) Multi, 2 units 2) Multi, 10-49
4) Multi, 10-49 units: Collapse with Multi, 10-49 units
5) Multi, 50+ units: Collapse priority 1) Multi, 10-49 units 2) Multi, 3-9 units 3) Multi, 2 units
6) Mobile home, boat, RV, or van: Collapse with Single unit, detached or other
7) Collapse any remaining small cells Single unit, detached or other

For Washington DC, we collapsed Single unit, detached or other and Single unit, attached even though the minimum threshold was met in both cells. The reason is that the responses to the question did not seem to coincide with the Census Bureau definition. The weighted percentages for this state prior to raking were $26 \%$ and $18 \%$ for detached and attached, respectively. The population percentages are $14 \%$ and $32 \%$ for detached and attached, respectively. This weighting adjustment was resulting in high weight differential and therefore we collapsed the two cells.

### 8.5.2 Imputation for Raking Variables

Missing values for the weighting variables were imputed based on the following strategy. All imputation was done separately by state. Age was imputed as the mean value for each gender and race category (if the race was missing, age was imputed as the mean value for each gender). Race was imputed as the modal value within county of residence. Marital status, educational attainment, and building type were imputed based on a nearest neighbor hot-deck algorithm. For respondents who were missing more than
one item (e.g. marital status and educational attainment), the algorithm imputed each missing item from the nearest neighbor with nonmissing responses to each item needed. Race, age, and gender were used to determine nearest neighbors.

### 8.5.3 Weight Trimming During the Raking

We used Izrael et al's rake and trim algorithm ${ }^{11}$ to rake the data to the population controls, yet maintain the UWE below 2.0. Weights were trimmed using the global high cap value (GHCV) method. This method reduced large weights and increases small weights when they exceeded the global lower or upper bounds (based on factors of the average weight). Delaware, Washington, DC, North Dakota, and Rhode Island were the only states to require trimming at this stage. The weights were also constrained from increasing more than five times the input weight (before raking); and from decreasing to less than 0.2 times its input weight.

[^4]
## Appendix A: NATS Dispositions and Calling Rules

2013-2014 NATS Disposition Codes for Landline and Cell Phones

| Description | AAPOR Code | Definition | \# of attempts | Call back rules |
| :---: | :---: | :---: | :---: | :---: |
| Completed interviews |  |  |  |  |
| Complete | 1.1 | Assign if respondent completes questionnaire. | $1-15$ <br> attempts |  |
| Partial Complete | 1.2 | LANDLINE <br> Definition: Four or more questions from among gender, age, multiple race (racemulti), Hispanic origin (hispanic), marital status (marital2), education (educa2), employment (employ2) and "Do you have more than one landline telephone number in your household?" (telnosgt1) have been answered with a response other than Don't know/Not sure or Refused. <br> CELL <br> Definition: Three or more questions from among gender, age, multiple race (racemulti), Hispanic origin (hispanic), marital status (marital2), education (educa2), employment (employ2) have been answered with a response other than Don't know/Not sure or Refused. <br> Calling rules: Make a second attempt to fully complete the interview after first refusal or termination. | $1-15$ <br> attempts | Respondent may be called back to fully complete the interview. Give final disposition on $15^{\text {th }}$ or subsequent call attempt even if there is only one occurrence of a refusal or termination. |

## Non completed, known eligible

| Description | AAPOR Code | Definition | \# of attempts | Call back rules |
| :---: | :---: | :---: | :---: | :---: |
| Break off/ termination within questionnaire | 2.1 | Assign if respondent has completed Q1 GENHEALTH with response other than "Don't know" or "refused' and terminates/breaks off prior to demographics section. See definition of partial. | $\begin{aligned} & \text { 1-15 } \\ & \text { attempts } \end{aligned}$ | May be assigned after one attempt if hard refusal or special circumstance. Assign after maximum number of attempts with at least one interim disposition of (break off/termination). |
| Household level refusal (landline only) | 2.111 | Assign for landline only if refusal after respondent selection but before Q1 GENHEALTH in landline. Refusal can be from any member of the household. Automated messages should not count as refusals. | $\begin{aligned} & 1-15 \\ & \text { attempts } \end{aligned}$ | May be assigned after one attempt if hard refusal or special circumstance. Assign after maximum number of attempts and at least one interim disposition of (household level refusal). |
| On never call list | 2.111 | Assign only if supervisor can determine that respondent is on never call list. Interviewer should not assign based on respondent information. (NOTE: If respondent insists that he/she is on never call list code assign household level refusal (2.111) or respondent refusal (2.112). | No attempt | Assign with confirmation by supervisor. |
| Known respondent refusal | 2.112 | Assign if refusal by selected respondent before Q1 GENHEALTH in landline. Automated messages should not count as refusals. Assign if cell phone respondent refuses after number determined to be personal phone (C2) and respondent confirms living in private residence (C4). | $\begin{aligned} & 1-15 \\ & \text { attempts } \end{aligned}$ | May be assigned after one attempt if hard refusal or special circumstance. Assign after maximum number of attempts and at least one interim disposition of (respondent refusal). |


| Respondent never available | 2.21 | Assign if respondent selected /known eligible, but never available. Respondent may not have been contacted or contacted and asked to be called later. Includes repeated unsafe location for interview, respondent away during period of interview, respondent not available for appointment. Includes selected respondents who die during interview period. | 1-15 attempts | Give final disposition when notified or after at least 5 calling occasions of no more than 3 attempts with at least 3 weekday, 3 weeknight and 3 weekend calls for landline. Cell phone respondents may be called up to 8 times, with at least 2 weekday, 2 weeknight and 2 weekend attempts. Assign after maximum number of calling attempts with at least one interim disposition of (appointment), or (unsafe location) and all others noncontact dispositions. |
| :---: | :---: | :---: | :---: | :---: |
| Respondent physically or mentally unable to complete interview | 2.32 | Assign if respondent selected but unable to complete interview due to physical or mental impairment. This includes temporary conditions such as bereavement, which will last beyond the interview period. | 1-6 attempts | Assign the first time a selected respondent is contacted or is described by someone else as physically or mentally incapable of completing survey or the second time a respondent who is physically or mentally impaired is contacted. |
| Language barrier, selected respondent | 2.33 | Selected respondent does not speak English or other language for which interviewers are available. (NOTE: If language barriers prevent completion of respondent selection, assign code 3.2 (language barrier, physical or mental impairment). | 1-6 attempts | Assign the first time a selected respondent is contacted or is described by someone else as not speaking English or other language for which interviewers are available. |
| Non completed, unknown eligible |  |  |  |  |
| Description | AAPOR Code | Definition | \# of attempts | Call back rules |
| Unknown if housing unit | 3.1 | Assign if hang up without confirming private residence (L2/C4) (landline and cell phone). Assign for landline sample if contact without completion of private household/college housing screener questions. | 1-15 <br> attempts | Give final disposition after second hang-up or termination or when a first time hang up will not be called back because of hard refusal or special circumstances. If the first occurrence is on $15^{\text {th }}$ attempt, give final disposition. Assign after maximum number of attempts with at least one interim disposition of 5050 (hang up, unknown if housing unit) and all others noncontact. |


| No answer | 3.13 | Assign if phone rings normally but no one answers. | $6-15$ <br> attempts |
| :---: | :---: | :---: | :---: |
| Answering device, unknown if residence or respondent eligible | 3.14 | Assign if answering device without confirmation of household (landline). Assign if cell phone reaches answering device. *note: all answering machine messages were coded as unknown unless the interviewer could confirm that it was ineligible. CDC disposition code "2.22-Answering device known residence" was not used because one cannot easily determine from a voicemail whether it is a residence or mixed-use phone. | 10-15 <br> attempts <br> for <br> landline; <br> up to 8 <br> attempts <br> for cell <br> phone |
| Telecommunication barrier | 3.15 | Assign if call blocking, message asking caller for identification or other ID requirements which cannot be met or other barrier established by potential respondent or household. Message does not provide information on whether number has reached a household or household resident. | 1-6 <br> attempts |

Give final disposition after at least 5 calling occasions of no more than 3 attempts with at least 3 weekday, 3 weeknight and 3 weekend calls for landline. Cell phone respondents may be called up to 8 times, with at least 2 weekday, 2 weeknight and 2 weekend attempts. Assign after maximum number of attempts with half or more interim dispositions of 5130 (no answer).

Give final disposition after at least 5 calling occasions of no more than 3 attempts with at least 3 weekday, 3 weeknight and 3 weekend calls for landline. Cell phone respondents may be called up to 8 times, with at least 2 weekday, 2 weeknight and 2 weekend attempts. Assign after maximum number of attempts with half or more interim dispositions of (answering device, unknown if eligible residence or respondent).

Give final disposition after up to 3 calling occasions of no more than 2 attempts with at least 2 weekday, 2 weeknight and 2 weekend calls for landline. Cell phone respondents may be called up to 6 times, with at least 2 weekday, 2 weeknight and 2 weekend attempts. Assign after maximum number of attempts with at least one interim disposition of (telecommunication barrier) and all others noncontact.

| Household, not known if respondent eligible | 3.2 | Assign for landline sample if private residence confirmed without selecting respondent. (NOTE: If contact is made and household eligibility is unknown, use code 3100). Assign for cell phone if contact is made with household resident without determining whether cell phone number and respondent are eligible. <br> Contact with group home may apply. Contact with vacation home may apply. Contact with household where residents are away for interview period may apply. | $1-15$ <br> attempts | Give final disposition after at least 5 calling occasions of no more than 3 attempts with at least 3 weekday, 3 weeknight and 3 weekend calls for landline. Cell phone respondents may be called up to 8 times, with at least 2 weekday, 2 weeknight and 2 weekend attempts. Assign after maximum number of attempts with at least one interim disposition of (respondent refusal, hang up or termination). |
| :---: | :---: | :---: | :---: | :---: |
| Physical or mental impairment (household level) | 3.2 | Assign if physical or mental impairment prevents determination of private residence or prevents determination of eligibility of household or resident. This is a household level assignment. If selected respondent is physically or mentally impaired assign 2.32 after first attempt. | 1-6 <br> attempts | Assign after maximum number of attempts with at least one interim disposition of (physical or mental impairment). |
| Language barrier, (household level) | 3.2 | Assign if language barrier prevents determination of private residence or prevents determination of eligibility of household or resident. This is a household level assignment. If selected respondent has language barrier assign 2.33 when informed. | $1-6$ <br> attempts | Assign after maximum number of attempts with at least one interim disposition of (language barrier). |


| Ineligible | AAPOR |  |  |  |
| :--- | :--- | :--- | :--- | :--- |
| Description | Definition | \# of <br> attempts |  |  |
| Fade |  |  |  |  |
| Out of sample |  |  | Assign if call reaches fax or data line without <br> human contact. | 1 1-6 |
| attempts |  |  |  |  |

## Call back rules

May be assigned after one attempt. If states choose to use six attempts, give final disposition after recommendation for 3 calling occasions with 2 weekday, 2 weeknight and 2 weekend calls for landline. If states choose to use six attempts, cell phone respondents may be called up to 6 times, with recommendations for 2 weekday, 2 weeknight and 2 weekend attempts. If six attempts are used, assign after maximum number of attempts with at least one interim disposition of (fax/data/modem) and all others noncontact.

Assigned as soon as sample ineligibility determined. This should take priority over other final dispositions.

May be assigned after one attempt. If states use six attempts, give final disposition after recommendation for 3 calling occasions with 2 weekday, 2 weeknight and 2 weekend calls for landline. Cell phone respondents may be called up to 6 times, with recommendations for 2 weekday, 2 weeknight and 2 weekend attempts. Assign after maximum number of attempts with at least one interim disposition of (technological barrier), (possible nonworking) or (busy) and all others noncontact.

$\left.$| Special |  |  |  |
| :--- | :--- | :--- | :--- |
| technological |  |  |  |
| circumstances/ |  |  |  |
| Always busy |  |  |  |$\quad 4.4$| Assign if repeated busy, fast busy or circuit |
| :--- |
| busy messages. Assign if repeated ambiguous |
| operator messages. Assign if repeated poor |
| audio quality. Assign if number repeatedly |
| does not connect. | | 1-6 |
| :--- |
| attempts. |
| Do not |
| call more |
| than 6 |
| attempts. | \right\rvert\, | Cell phone |
| :--- |

May be assigned after one attempt or pre assigned using precall status. Assign as soon as interviewer reaches number resulting in tritone. If states use six attempts, give final disposition after recommendation for 3 calling occasions with 2 weekday, 2 weeknight and 2 weekend calls for landline. Cell phone respondents may be called up to 6 times, with recommendations for 2 weekday, 2 weeknight and 2 weekend attempts. Assign after maximum number of attempts with interim dispositions of (fax/data/modem), (technological barrier), (possible nonworking) and/or (busy) and all others noncontact.
Given final disposition when informed. This disposition should take priority over other possible final dispositions for the landline sample. This disposition code should be preassigned to precall status code which indicates cell phone in the landline sample.
May be assigned after one attempt. May give final disposition after respondent or automated message informs that the number has been forwarded after multiple attempts. May give final disposition after series of beeps indicates a pager has been reached. If states use six attempts, give final disposition after recommendation for 3 calling occasions with 2 weekday, 2 weeknight and 2 weekend calls for landline. Cell phone respondents may be called up to 6 times, with recommendations for 2 weekday, 2 weeknight and 2 weekend attempts.
Given final disposition when informed. This disposition should take priority over other possible final dispositions for the cell phone sample.
Given final disposition when informed. This disposition should take priority over other possible final dispositions for the cell phone sample.

| Non residence | 4.5 | Assign if business, government or other <br> organization. | 1-15 <br> attempts | Given final disposition when informed. This disposition <br> should take priority over other possible final dispositions. <br> This disposition should be assigned to numbers with a <br> precall status of 5. |
| :--- | :--- | :--- | :--- | :--- |
| Group home | 4.53 | Assign if respondent identifies number as <br> reaching a group home, prison, halfway <br> house, nursing home or hospital. College <br> dormitories, college housing, graduate <br> student housing, sorority/fraternity housing, <br> or other college provided housing is not <br> defined as group home. | attempts | Given final disposition when informed. This disposition <br> should take priority over other possible final dispositions. |
| Household, no |  |  |  |  |
| eligible respondent | 4.7 | Assign if child phone (landline or cell phone). <br> Assign if landline household without eligible <br> respondent. | $1-15$ <br> attempts | Given final disposition when informed. This disposition <br> should take priority over other possible final dispositions. |

## Appendix B: Advance Letters

## Dear Resident,

We are writing to ask for your help with an important study being conducted by the Centers for Disease Control and Prevention (CDC). We're gathering information from adults on health and tobacco; your phone number was chosen randomly from phone numbers across the U.S. ICF, a health research company, will call you. They will identify themselves as calling for the CDC. If the call comes at a busy time, please give the interviewer a better time to call you back.

The interview takes about 15-25 minutes and can be completed when ICF calls or at a later time. You can call, toll-free, 1-877-386-6789 if you have any questions or if you want to schedule a convenient time for you to complete the interview.

The CDC will use the data collected by this study to develop more effective public health programs.

Your participation is completely voluntary, and you may choose not to answer any question or to end the interview at any time. If you do not wish to participate, be assured there is no penalty or loss of benefit to which you may otherwise be entitled. If you do participate, your answers to survey questions will be kept private, to the extent permitted by law. No person or household will be identified in any reports from the study.

We hope you will take the time to help with this important research.
Thank you for your assistance. If you have any further questions, please call 1-877-386-6789.

Sincerely,


Tim McAfee, MD, MPH<br>Director, Office on Smoking and Health<br>National Center for Chronic Disease Prevention and Health Promotion

## DEPARTMENT OF HEALTH \& HUMAN SERVICES

Public Health Service
Centers for Disease Control
and Prevention (CDC)
Atlanta GA 30341-3724
Estimado Residente:
Nos dirigimos a usted a fin de solicitarle su colaboración para un importante estudio que están realizando los Centros para el Control y la Prevención de Enfermedades (Centers for Disease Control and Prevention, CDC). Estamos en proceso de reunir información de adultos sobre la salud y el tabaco, y su número telefónico fue seleccionado al azar de entre números de todos los EE. UU. Una empresa de investigación sobre la salud, ICF, se pondrá en contacto con usted. Para identificarse, le dirán que lo llaman en nombre de los CDC. Si lo llaman en un momento inoportuno, indíquele al entrevistador un horario para que vuelva a llamarlo.

La entrevista lleva entre 15 y 25 minutos, y puede completarse cuando ICF lo llame o bien después. Usted puede llamar a la línea gratuita 1-877-386-6789 si tiene alguna pregunta o si desea coordinar un momento más conveniente para realizar la entrevista.

Los CDC utilizarán la información recabada en este estudio para desarrollar programas de salud pública más eficaces.

Su participación es de carácter totalmente voluntario. Además, usted puede optar por no responder a alguna de las preguntas o dar por finalizada la entrevista en cualquier momento. En caso de que no desee participar, tenga la seguridad de que no habrá sanciones ni pérdida de beneficios a los cuales pueda tener derecho de otro modo. Si participa, sus respuestas a las preguntas de la encuesta serán privadas, tal como lo permite la ley. En los informes de este estudio no se identificará a ninguna persona ni familia.

Esperamos que decida dedicar un tiempo para colaborar con esta importante investigación.
Agradecemos su colaboración. Si tiene alguna otra pregunta, llame al 1-877-386-6789.
Atentamente,


Tim McAfee, MD, MPH<br>Director, Office on Smoking and Health<br>National Center for Chronic Disease Prevention and Health Promotion

## Appendix C: IVR SCRIPT

## National Adult Tobacco Survey IVR Script

## Greeting

Hello, you have reached the phone line for the National Adult Tobacco Survey, which is sponsored by the US Centers for Disease Control and Prevention, commonly known as the CDC. The National Adult Tobacco Survey is an important study about tobacco-related experiences and opinions of all adults 18 and older throughout the United States. If you would like to continue in English, please press ' 1 '. Si desea continuar en español marque el 3 ahora.

Go to Spanish if ' 1 ' is not pressed.

Buenas. Ha llamado a la línea para la Encuesta Nacional de Adultos Sobre el Tabaco. El estudio está patrocinado por los Centros para el Control y la Prevención de Enfermedades de los Estados Unidos, conocido comúnmente como el CDC, por sus siglas en inglés. La Encuesta Nacional de Adultos Sobre el Tabaco es un estudio importante acerca de las experiencias y opiniones relacionadas con el tabaco en todos adultos mayores de 18 años a través de los Estados Unidos. Si desea continuar en español, marque el 3 ahora.

Go to Spanish if ' 1 ' is not pressed.

## Menu

1) If you would like to learn more about the study, please press ' 1 '

Si quisiera saber más sobre el estudio, marque el 1
2) If you would like to speak to a survey representative for more information, to take the survey now, to schedule a time to take the survey, or to decline the survey, please press ' 2 '

Para hablar con un representante de la encuesta, obtener más información, tomar la encuesta, decirnos un mejor momento para hablarle, o para declinar la encuesta, por favor marque el 2

## Option 1: More Information

1. The CDC has contracted with ICF Macro, a health research company, to conduct interviews for the National Adult Tobacco Survey. Phone numbers are randomly selected to be called. Participation in the survey is voluntary, and your answers will be maintained in a secure manner. The National Adult Tobacco Survey will interview over 75,000 people. If you would like to speak to a survey representative for more information, to take the survey now, to schedule a time to take the survey, or to decline the survey, please press ' 2 '.
2. EI CDC ha contratado a ICF Macro, una compañía que realiza estudios relacionados a la salud, para conducir entrevistas para la Encuesta Nacional de Adultos Sobre el Tabaco. Los números de teléfono son escogidos al azar para esta encuesta. Participación en esta encuesta es voluntaria, y sus respuestas se mantendrán de manera segura. La Encuesta nacional de adultos sobre el tabaco entrevistará más de 75,000 personas. Para hablar con un representante de la encuesta, obtener más información, tomar la encuesta, decirnos un mejor momento para hablarle, o para declinar la encuesta, por favor marque el 2.

## Option 2: Transfer to Supervisor

2. Transfer call to a call room supervisor who will address concerns, attempt to convert the refusal (if necessary), and then remove the number from the study if still requested.
[If no representative is available, caller is routed to the following message on a dedicated Voicemail box:]

## Option 3: Voicemail

3. You've reached the private voicemail for the National Adult Tobacco Survey. The survey center is closed or all survey representatives are busy at this time. If you would like to be contacted by a survey representative from ICF, please leave a brief message, including your name, your phone number, and when you would like to be called back. Your interest in this study is greatly appreciated. Thank you and we look forward to talking with you soon.

Ha llegado al buzón de voz privado para la Encuesta Nacional de Adultos Sobre el Tabaco. El centro de encuestas está cerrado, o todos los representantes están ocupados en este momento. Si desea ser contactado por un representante de la encuesta de ICF, por favor deje un breve mensaje incluyendo su nombre, número de teléfono y hora que desee que le regresemos su llamada. Su interés en este estudio es muy agradecido. Gracias y anticipamos hablar con usted muy pronto.

## Appendix D: Base Weights and Eligibility Adjustments

Table D-1. Base Weights and Eligibility Adjustments
a. Landline

HIGH DENSITY (LISTED) LOW DENSITY (UNLISTED)

| $\begin{gathered} \text { STATE } \\ \text { FIPS } \end{gathered}$ | $N_{i}$ | $n_{i}$ | W1 | W1 with unk adj | $N$ | $n_{i}$ | W1 | W1 with unk adj |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 01 | 1315864 | 5204 | 252.86 | 90.48 | 3435020 | 9016 | 380.99 | 5.08 |
| 02 | 179378 | 3998 | 44.87 | 18.24 | 697672 | 10402 | 67.07 | 1.04 |
| 04 | 1272659 | 6599 | 192.86 | 69.64 | 4145341 | 14461 | 286.66 | 6.45 |
| 05 | 626156 | 4485 | 139.61 | 55.83 | 1958511 | 9315 | 210.25 | 2.45 |
| 06 | 7652055 | 38569 | 198.40 | 72.49 | 24463628 | 82391 | 296.92 | 7.05 |
| 08 | 1134868 | 4253 | 266.84 | 110.57 | 3879648 | 9727 | 398.85 | 8.02 |
| 09 | 1047539 | 4437 | 236.09 | 114.70 | 2480102 | 7053 | 351.64 | 8.73 |
| 10 | 280667 | 5240 | 53.56 | 22.02 | 601599.7 | 7480 | 80.43 | 1.85 |
| 11 | 142067 | 3949 | 35.98 | 14.29 | 770982.8 | 14231 | 54.18 | 0.93 |
| 12 | 4583661 | 19019 | 241.00 | 82.66 | 14665172 | 40651 | 360.76 | 6.52 |
| 13 | 2285743 | 8711 | 262.40 | 100.55 | 6963257 | 17659 | 394.32 | 5.33 |
| 15 | 229040 | 5723 | 40.02 | 15.08 | 1061352 | 17587 | 60.35 | 1.37 |
| 16 | 296908 | 3889 | 76.35 | 33.92 | 1094542 | 9581 | 114.24 | 1.69 |
| 17 | 2850903 | 11985 | 237.87 | 93.59 | 10125780 | 28365 | 356.98 | 4.91 |
| 18 | 1617237 | 4850 | 333.45 | 154.12 | 4552672 | 9130 | 498.65 | 5.44 |
| 19 | 811426 | 3723 | 217.95 | 105.83 | 2579599 | 7857 | 328.32 | 2.68 |
| 20 | 694039 | 4064 | 170.78 | 77.15 | 2118828 | 8296 | 255.40 | 2.84 |
| 21 | 1088572 | 4271 | 254.88 | 112.81 | 3066645 | 7969 | 384.82 | 5.98 |
| 22 | 1155261 | 5406 | 213.70 | 79.26 | 3618747 | 11274 | 320.98 | 2.75 |
| 23 | 459385 | 3750 | 122.50 | 52.77 | 1071440 | 5820 | 184.10 | 3.63 |
| 24 | 1535240 | 5134 | 299.03 | 125.65 | 4236069 | 9506 | 445.62 | 9.38 |
| 25 | 2008893 | 5982 | 335.82 | 165.69 | 4273915 | 8478 | 504.12 | 10.73 |
| 26 | 2544013 | 9571 | 265.80 | 104.69 | 8249945 | 20759 | 397.42 | 4.11 |
| 27 | 1472284 | 3518 | 418.50 | 206.09 | 4346816 | 6892 | 630.71 | 8.54 |
| 28 | 596932 | 4931 | 121.06 | 45.52 | 1993260 | 11029 | 180.73 | 2.05 |
| 29 | 1463330 | 4508 | 324.61 | 143.84 | 4090787 | 8392 | 487.46 | 7.43 |
| 30 | 242817 | 3306 | 73.45 | 35.56 | 878616.3 | 8004 | 109.77 | 2.11 |
| 31 | 444248 | 3906 | 113.74 | 57.81 | 1451818 | 8514 | 170.52 | 1.85 |
| 32 | 622860 | 5606 | 111.11 | 42.04 | 1611706 | 9664 | 166.77 | 3.11 |
| 33 | 425075 | 4179 | 101.72 | 45.86 | 951816.8 | 6291 | 151.30 | 3.29 |
| 34 | 2256081 | 8677 | 260.01 | 104.18 | 7320727 | 18803 | 389.34 | 10.83 |
| 35 | 402380 | 3857 | 104.32 | 45.50 | 1410204 | 9013 | 156.46 | 2.66 |
| 36 | 4788651 | 18000 | 266.04 | 122.44 | 14464941 | 36300 | 398.48 | 11.13 |
| 37 | 2439957 | 7530 | 324.03 | 143.49 | 6529101 | 13440 | 485.80 | 8.83 |
| 38 | 165510 | 3538 | 46.78 | 27.33 | 668040.3 | 9512 | 70.23 | 0.60 |
| 39 | 2706810 | 9371 | 288.85 | 136.65 | 9306606 | 21469 | 433.49 | 6.66 |


|  | HIGH DENSITY (LISTED) |  |  | LOW DENSITY (UNLISTED) |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\begin{gathered} \text { STATE } \\ \text { FIPS } \end{gathered}$ | $N_{i}$ | $n_{i}$ | W1 | W1 with unk adj | $N$ | $n_{i}$ | W1 | W1 with unk adj |
| 40 | 936923 | 5183 | 180.77 | 68.17 | 2569986 | 9427 | 272.62 | 3.55 |
| 41 | 828833 | 3146 | 263.46 | 128.31 | 2978251 | 7504 | 396.89 | 10.71 |
| 42 | 3719097 | 10519 | 353.56 | 166.87 | 8668636 | 16331 | 530.81 | 12.19 |
| 44 | 324598 | 5191 | 62.53 | 36.39 | 631493.9 | 6809 | 92.74 | 6.00 |
| 45 | 1133106 | 4137 | 273.90 | 122.88 | 3219852 | 7863 | 409.49 | 7.76 |
| 46 | 201694 | 3754 | 53.73 | 26.26 | 834055.8 | 10316 | 80.85 | 0.47 |
| 47 | 1586212 | 5733 | 276.68 | 110.09 | 4522272 | 11007 | 410.85 | 6.10 |
| 48 | 5070684 | 27524 | 184.23 | 60.73 | 16466075 | 59626 | 276.16 | 2.91 |
| 49 | 475054 | 3587 | 132.44 | 57.19 | 1651063 | 8413 | 196.25 | 3.83 |
| 50 | 239056 | 3131 | 76.35 | 39.55 | 565502.5 | 4939 | 114.50 | 3.06 |
| 51 | 2059456 | 6160 | 334.33 | 163.05 | 5605252 | 11150 | 502.71 | 9.18 |
| 53 | 1536789 | 4812 | 319.37 | 143.01 | 4932220 | 10338 | 477.10 | 10.52 |
| 54 | 576300 | 4050 | 142.30 | 73.10 | 1021292 | 4770 | 214.11 | 5.06 |
| 55 | 1513134 | 4003 | 378.00 | 194.14 | 4217616 | 7427 | 567.88 | 5.94 |
| 56 | 115231 | 3683 | 31.29 | 14.60 | 438486.1 | 9397 | 46.66 | 0.68 |

b. Cell Phone Base Weights

HIGH DENSITY (ACTIVE)
LOW DENSITY (INACTIVE)

| STATE <br> FIPS | $N \times n_{i} / n$ | $n_{i}^{*}$ | W1 | W1 with <br> unk adj | $N \times n_{i} / n$ | $n_{i}^{*}$ | W1 | W1 with <br> unk adj |
| :---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| $\mathbf{0 1}$ | 3925879 | 6202 | 633.00 | 214.79 | 3846819 | 1688 | 2278.92 | 25.53 |
| $\mathbf{0 2}$ | 749163 | 5562 | 134.69 | 21.91 | 764504 | 1548 | 493.87 | 8.72 |
| $\mathbf{0 4}$ | 5066035 | 7460 | 679.09 | 260.78 | 2915296 | 1180 | 2470.59 | 49.35 |
| $\mathbf{0 5}$ | 2283839 | 4547 | 502.27 | 193.09 | 2255244 | 1213 | 1859.23 | 16.95 |
| $\mathbf{0 6}$ | 31710027 | 54897 | 577.63 | 181.13 | 16248019 | 7713 | 2106.58 | 40.44 |
| $\mathbf{0 8}$ | 4332385 | 5359 | 808.43 | 285.08 | 2317541 | 791 | 2929.89 | 55.05 |
| $\mathbf{0 9}$ | 3040255 | 9456 | 321.52 | 93.18 | 1366916 | 1164 | 1174.33 | 24.68 |
| $\mathbf{1 0}$ | 816964 | 7812 | 104.58 | 27.73 | 424816 | 1158 | 366.85 | 7.77 |
| $\mathbf{1 1}$ | 1092768 | 6845 | 159.64 | 42.78 | 820565 | 1435 | 571.82 | 15.41 |
| $\mathbf{1 2}$ | 16614778 | 25825 | 643.36 | 214.90 | 9327841 | 3995 | 2334.88 | 33.55 |
| $\mathbf{1 3}$ | 8489279 | 9807 | 865.63 | 313.15 | 5922856 | 1893 | 3128.82 | 49.63 |
| $\mathbf{1 5}$ | 1214591 | 6961 | 174.49 | 59.76 | 533019 | 839 | 635.30 | 12.26 |
| $\mathbf{1 6}$ | 1252198 | 3806 | 329.01 | 140.30 | 588029 | 484 | 1214.94 | 32.54 |
| $\mathbf{1 7}$ | 11090347 | 16102 | 688.76 | 240.54 | 8258018 | 3308 | 2496.38 | 24.48 |
| $\mathbf{1 8}$ | 5216265 | 6795 | 767.66 | 266.69 | 3124735 | 1125 | 2777.54 | 57.30 |
| $\mathbf{1 9}$ | 2465614 | 4936 | 499.52 | 186.74 | 1713838 | 944 | 1815.51 | 35.25 |
| $\mathbf{2 0}$ | 2270290 | 4319 | 525.65 | 214.38 | 2352710 | 1231 | 1911.22 | 6.50 |
| $\mathbf{2 1}$ | 3551581 | 5426 | 654.55 | 212.99 | 2412485 | 1024 | 2355.94 | 50.06 |


| HIGH DENSITY (ACTIVE) |  |  |  | LOW DENSITY (INACTIVE) |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\begin{gathered} \text { STATE } \\ \text { FIPS } \end{gathered}$ | $N \times n_{i} / n$ | $n_{i}^{*}$ | W1 | W1 with unk adj | $N \times n_{i} / n$ | $n_{i}^{*}$ | W1 | W1 with unk adj |
| 22 | 4141944 | 6288 | 658.71 | 214.90 | 3967334 | 1662 | 2387.08 | 21.88 |
| 23 | 1081318 | 5985 | 180.67 | 62.58 | 633172 | 945 | 670.02 | 12.46 |
| 24 | 5105320 | 7478 | 682.71 | 229.93 | 3325597 | 1342 | 2478.09 | 53.33 |
| 25 | 5949176 | 11435 | 520.26 | 148.27 | 3958717 | 2095 | 1889.60 | 38.83 |
| 26 | 9134308 | 12654 | 721.85 | 233.53 | 7360399 | 2796 | 2632.47 | 50.45 |
| 27 | 4405926 | 6140 | 717.58 | 244.16 | 2751157 | 1060 | 2595.43 | 45.84 |
| 28 | 2235916 | 4676 | 478.17 | 178.90 | 2019584 | 1174 | 1720.26 | 25.01 |
| 29 | 4857130 | 6165 | 787.86 | 300.67 | 3201517 | 1125 | 2845.79 | 41.95 |
| 30 | 798560 | 3968 | 201.25 | 79.10 | 863370 | 1192 | 724.30 | 9.74 |
| 31 | 1521145 | 5229 | 290.91 | 104.63 | 1185355 | 1131 | 1048.06 | 8.28 |
| 32 | 2300232 | 6560 | 350.65 | 120.66 | 1176518 | 910 | 1292.88 | 29.81 |
| 33 | 1120796 | 6411 | 174.82 | 57.41 | 651570 | 1029 | 633.21 | 11.59 |
| 34 | 7879910 | 17289 | 455.78 | 126.59 | 4572380 | 2751 | 1662.08 | 26.89 |
| 35 | 1672435 | 4920 | 339.93 | 120.64 | 1079315 | 870 | 1240.59 | 37.92 |
| 36 | 18238119 | 32668 | 558.29 | 173.35 | 9898750 | 4892 | 2023.46 | 30.88 |
| 37 | 7766384 | 11085 | 700.62 | 236.62 | 5058316 | 1995 | 2535.50 | 34.66 |
| 38 | 616646 | 5408 | 114.02 | 35.94 | 683858 | 1672 | 409.01 | 1.76 |
| 39 | 10688377 | 15964 | 669.53 | 208.76 | 6918348 | 2876 | 2405.55 | 38.67 |
| 40 | 3119333 | 4919 | 634.14 | 246.61 | 3204207 | 1381 | 2320.21 | 31.67 |
| 41 | 3187658 | 4704 | 677.65 | 261.52 | 1282840 | 516 | 2486.12 | 88.50 |
| 42 | 10622477 | 18378 | 578.00 | 177.26 | 6144141 | 2922 | 2102.72 | 25.67 |
| 44 | 912754 | 10771 | 84.74 | 22.34 | 465610 | 1529 | 304.52 | 5.33 |
| 45 | 3831775 | 6004 | 638.20 | 216.41 | 2426648 | 1046 | 2319.93 | 33.82 |
| 46 | 634255 | 4470 | 141.89 | 54.10 | 554079 | 1080 | 513.04 | 4.16 |
| 47 | 5700480 | 6824 | 835.36 | 289.81 | 3674531 | 1216 | 3021.82 | 46.29 |
| 48 | 21919011 | 30026 | 730.00 | 253.35 | 13955925 | 5284 | 2641.17 | 40.26 |
| 49 | 2265295 | 4089 | 554.00 | 204.97 | 1363789 | 681 | 2002.63 | 44.28 |
| 50 | 513051 | 6231 | 82.34 | 20.05 | 233815 | 789 | 296.34 | 7.73 |
| 51 | 6986710 | 9720 | 718.80 | 229.35 | 4131394 | 1590 | 2598.36 | 61.80 |
| 53 | 5698200 | 6551 | 869.82 | 312.12 | 2408300 | 769 | 3131.73 | 68.41 |
| 54 | 1422724 | 7536 | 188.79 | 54.74 | 863872 | 1254 | 688.89 | 4.92 |
| 55 | 4534988 | 6094 | 744.17 | 269.09 | 3114587 | 1166 | 2671.17 | 28.48 |
| 56 | 501192 | 4469 | 112.15 | 36.56 | 940740 | 2341 | 401.85 | 1.14 |

## Appendix E: Weight Trimming and Unequal Weighting Effect

Table E-1. Summary of Weight trimming and the UWE before and after trimming.

TRIMMING STEP 1

| REPORTED STATE (Q99) | UWE before trimming | $\begin{array}{r} 1.5 * \mathrm{Max} \\ \text { weight } \\ \text { (sample } \\ \text { state) } \end{array}$ | Weights trimmed | UWE | Q3 | IQR | Q3+3IQR | Weights trimmed | UWE |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 01 | 1.2364 | 26312.6 |  | 1.2364 | 4588.2 | 2644.8 | 12522.6 |  | 1.2364 |
| 02 | 2.0309 | 2265.8 | 17 | 1.3957 | 557.4 | 145.5 | 993.9 |  | 1.3957 |
| 04 | 1.3137 | 30099.7 |  | 1.3137 | 4742.0 | 3014.9 | 13786.6 |  | 1.3137 |
| 05 | 1.3297 | 16805.0 |  | 1.3297 | 2933.0 | 1913.1 | 8672.2 |  | 1.3297 |
| 06 | 1.2747 | 32579.3 |  | 1.2747 | 4531.5 | 2587.2 | 12293.1 |  | 1.2747 |
| 08 | 1.2444 | 28367.6 |  | 1.2444 | 4740.2 | 2588.5 | 12505.5 |  | 1.2444 |
| 09 | 1.1868 | 19688.7 |  | 1.1868 | 4048.8 | 2024.4 | 10122.0 |  | 1.1868 |
| 10 | 1.8622 | 4043.8 | 9 | 1.3378 | 843.6 | 298.8 | 1739.9 |  | 1.3378 |
| 11 | 3.2568 | 5710.4 | 8 | 3.1319 | 778.9 | 536.5 | 2388.5 | 36 | 1.8443 |
| 12 | 1.3069 | 35932.9 |  | 1.3069 | 4899.4 | 2941.0 | 13722.4 |  | 1.3069 |
| 13 | 1.2578 | 31908.6 |  | 1.2578 | 5150.0 | 3060.2 | 14330.6 |  | 1.2578 |
| 15 | 1.6575 | 7675.2 |  | 1.6575 | 1405.3 | 950.1 | 4255.8 |  | 1.6575 |
| 16 | 1.4590 | 10870.4 |  | 1.4590 | 1962.5 | 1404.8 | 6176.7 |  | 1.4590 |
| 17 | 1.2694 | 35770.0 |  | 1.2694 | 4609.2 | 2612.7 | 12447.1 |  | 1.2694 |
| 18 | 1.1972 | 28289.4 |  | 1.1972 | 5079.1 | 2471.1 | 12492.4 |  | 1.1972 |
| 19 | 1.1792 | 19095.5 |  | 1.1792 | 3307.2 | 1938.8 | 9123.6 |  | 1.1792 |
| 20 | 1.2432 | 18484.8 |  | 1.2432 | 3176.1 | 1934.4 | 8979.3 |  | 1.2432 |
| 21 | 1.2382 | 22067.4 |  | 1.2382 | 3827.4 | 2029.5 | 9916.0 |  | 1.2382 |
| 22 | 1.2630 | 28173.2 |  | 1.2630 | 4262.4 | 2543.6 | 11893.2 |  | 1.2630 |
| 23 | 1.1722 | 7074.2 |  | 1.1722 | 1430.2 | 588.3 | 3195.0 |  | 1.1722 |
| 24 | 1.2118 | 31255.3 |  | 1.2118 | 5464.7 | 3034.6 | 14568.6 |  | 1.2118 |
| 25 | 1.1901 | 27339.4 |  | 1.1901 | 5651.5 | 2346.2 | 12690.2 |  | 1.1901 |
| 26 | 1.2895 | 34408.3 |  | 1.2895 | 5293.7 | 3159.3 | 14771.5 |  | 1.2895 |
| 27 | 1.1826 | 28559.1 |  | 1.1826 | 5402.4 | 2557.9 | 13076.1 |  | 1.1826 |
| 28 | 1.4764 | 19057.2 |  | 1.4764 | 2837.1 | 2024.3 | 8910.0 |  | 1.4764 |
| 29 | 1.1952 | 35493.4 |  | 1.1952 | 5283.6 | 3116.1 | 14631.9 |  | 1.1952 |
| 30 | 1.3974 | 5897.8 | 3 | 1.3706 | 1092.5 | 598.0 | 2886.4 |  | 1.3706 |
| 31 | 1.1859 | 10268.6 |  | 1.1859 | 1900.1 | 1023.0 | 4969.0 |  | 1.1859 |
| 32 | 1.3317 | 15578.5 |  | 1.3317 | 2703.7 | 1640.1 | 7624.0 |  | 1.3317 |
| 33 | 1.2039 | 7026.6 |  | 1.2039 | 1408.1 | 600.7 | 3210.3 |  | 1.2039 |
| 34 | 1.1907 | 42490.9 |  | 1.1907 | 4959.8 | 2428.7 | 12245.8 |  | 1.1907 |
| 35 | 1.4417 | 12357.0 |  | 1.4417 | 1826.8 | 1062.2 | 5013.5 |  | 1.4417 |
| 36 | 1.2374 | 41000.4 |  | 1.2374 | 5503.4 | 3005.1 | 14518.5 |  | 1.2374 |
| 37 | 1.1811 | 32721.2 |  | 1.1811 | 4948.9 | 2192.7 | 11527.1 |  | 1.1811 |
| 38 | 1.9806 | 3594.5 | 19 | 1.5680 | 689.5 | 319.6 | 1648.2 |  | 1.5680 |
| 39 | 1.2087 | 32810.1 |  | 1.2087 | 5030.6 | 2742.6 | 13258.5 |  | 1.2087 |
| 40 | 1.3144 | 24600.7 |  | 1.3144 | 3979.1 | 2614.2 | 11821.8 |  | 1.3144 |


| $\mathbf{4 1}$ | 1.2203 | 24337.4 |  | 1.2203 | 4095.6 | 2091.4 | 10369.8 |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| $\mathbf{4 2}$ | 1.1581 | 26681.2 |  | 1.1581 | 5452.0 | 2409.5 | 12680.5 |
| $\mathbf{4 4}$ | 1.4248 | 7197.1 | 1 | 1.4032 | 1381.1 | 567.5 | 3083.7 |
| $\mathbf{4 5}$ | 1.1721 | 21382.1 |  | 1.1721 | 4578.6 | 2466.7 | 11978.8 |
| $\mathbf{4 6}$ | 1.5717 | 4535.9 | 6 | 1.5019 | 836.3 | 444.3 | 2169.3 |
| $\mathbf{4 7}$ | 1.2500 | 34972.6 |  | 1.2500 | 5374.5 | 3332.3 | 15371.4 |
| $\mathbf{4 8}$ | 1.3743 | 37483.4 |  | 1.3743 | 4661.7 | 3073.6 | 13882.4 |
| $\mathbf{4 9}$ | 1.3274 | 16850.7 |  | 1.3274 | 3044.2 | 1705.8 | 8161.7 |
| $\mathbf{5 0}$ | 1.7275 | 3956.3 | 12 | 1.5160 | 910.8 | 479.9 | 2350.6 |
| $\mathbf{5 1}$ | 1.1812 | 29846.7 |  | 1.1812 | 5166.8 | 2454.4 | 12530.0 |
| $\mathbf{5 3}$ | 1.2065 | 30351.6 |  | 1.2065 | 4948.9 | 2430.8 | 12241.3 |
| $\mathbf{5 4}$ | 1.2258 | 7797.9 |  | 1.2258 | 1996.9 | 791.5 | 4371.4 |
| $\mathbf{5 5}$ | 1.1561 | 30080.1 |  | 1.1561 | 5586.8 | 2730.9 | 13779.4 |
| $\mathbf{5 6}$ | 2.2750 | 3037.9 | 11 | 1.6170 | 565.2 | 345.1 | 1600.4 |

## Table E-2. Population Totals—State by Gender by Age Category (Male)

| STATE |  | TOTAL | 18-24 | 25-34 | 35-44 | 45-54 | 55-64 | 65-74 | 75+ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 01 | Alabama | 1709642 | 518071 |  | 282840 | 313310 | 293267 |  |  |
| 02 | Alaska | 265787 | 96598 |  | 91040 |  | 46293 | 31856 |  |
| 04 | Arizona | 2367627 | 745065 |  | 397889 | 399248 | 364229 | 273428 | 187768 |
| 05 | Arkansas | 1045252 | 315378 |  | 360994 |  | 173658 | 119204 | 76018 |
| 06 | California | 13859138 | 1917091 | 2751721 | 2526166 | 2527036 | 2077923 | 1236949 | 822252 |
| 08 | Colorado | 1936942 | 628553 |  | 362774 | 344892 | 316226 | 179613 | 104884 |
| 09 | Connecticut | 1290489 | 360794 |  | 478298 |  | 226222 | 133304 | 91871 |
| 10 | Delaware | 329925 | 95861 |  | 53312 | 61622 | 55681 |  |  |
| 11 | DC | 229308 | 91260 |  | 42343 | 37374 | 30467 | 27864 |  |
| 12 | Florida | 7214035 | 837797 | 1179161 | 1146165 | 1290054 | 1158289 | 913849 | 688720 |
| 13 | Georgia | 3438664 | 458204 | 630070 | 659787 | 648209 | 535711 | 334018 | 172665 |
| 15 | Hawaii | 524444 | 166888 |  | 90720 | 85734 | 85320 | 95782 |  |
| 16 | Idaho | 569554 | 176051 |  | 195557 |  | 95108 | 102838 |  |
| 17 | Illinois | 4609936 | 584249 | 857391 | 831708 | 856929 | 753287 | 437416 | 288956 |
| 18 | Indiana | 2316044 | 695605 |  | 403271 | 435095 | 397530 | 236498 | 148045 |
| 19 | Iowa | 1108183 | 327724 |  | 178088 | 204011 | 197442 | 116591 | 84327 |
| 20 | Kansas | 1026856 | 329943 |  | 352362 |  | 173546 | 100105 | 70900 |
| 21 | Kentucky | 1574310 | 463622 |  | 270893 | 295864 | 272877 | 271054 |  |
| 22 | Louisiana | 1607755 | 525612 |  | 262651 | 289930 | 273821 | 255741 |  |
| 23 | Maine | 499438 | 121273 |  | 76491 | 100067 | 97973 | 63702 | 39932 |
| 24 | Maryland | 2108354 | 641994 |  | 366899 | 418623 | 349128 | 331710 |  |
| 25 | Massachusetts | 2409585 | 714749 |  | 402613 | 476613 | 407459 | 243271 | 164880 |
| 26 | Michigan | 3574659 | 462018 | 574114 | 580654 | 680576 | 640298 | 389100 | 247899 |
| 27 | Minnesota | 1962045 | 595643 |  | 325241 | 379561 | 336248 | 193542 | 131810 |


| 28 | Mississippi | 1017473 | 313549 |  | 356896 |  | 174365 | 108347 | 64316 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 29 | Missouri | 2147392 |  |  | 352295 | 401571 | 365034 | 384613 |  |
| 30 | Montana | 377276 |  |  | 121343 |  | 73955 | 75822 |  |
| 31 | Nebraska | 664229 |  |  | 229493 |  | 112122 | 112649 |  |
| 32 | Nevada | 1040056 | 322 |  | 188856 | 190978 | 161776 | 112840 | 62857 |
| 33 | New Hamp. | 494768 |  |  | 80439 | 104666 | 95796 |  |  |
| 34 | New Jersey | 3203565 | 376524 | 550909 | 573333 | 643160 | 530150 | 315825 | 213664 |
| 35 | New Mexico | 748518 | 235744 |  |  | 248487 | 125475 | 85699 | 53113 |
| 36 | New York | 7059752 | 878725 | 1348013 | 1209335 | 1331246 | 1147774 | 681812 | 462847 |
| 37 | North Carolina | 3474740 | 450212 | 594442 | 631735 | 639902 | 562353 | 380482 | 215614 |
| 38 | North Dakota | 272362 | 95469 |  | 87327 |  | 45567 | 43999 |  |
| 39 | Ohio | 4133210 | 495701 | 692387 | 683354 | 790683 | 739562 | 441355 | 290168 |
| 40 | Oklahoma | 1348688 | 428127 |  | 235163 | 231495 | 219137 | 144750 | 90016 |
| 41 | Oregon | 1455869 | 427512 |  | 257855 | 247898 | 255978 | 165506 | 101120 |
| 42 | Pennsylvania | 4619784 | 527860 | 766984 | 741976 | 884542 | 828077 | 508411 | 361934 |
| 44 | Rhode Island | 384532 | 115176 |  | 135469 |  | 67235 | 39905 | 26747 |
| 45 | South Carolina | 1683736 | 496316 |  | 590119 |  | 285859 | 202499 | 108943 |
| 46 | South Dakota | 300647 | 90144 |  | 51145 | 52612 | 52943 | 53803 |  |
| 47 | Tennessee | 2319967 | 690429 |  | 406418 | 427101 | 390900 | 260577 | 144542 |
| 48 | Texas | 9150941 | 1291997 | 1836018 | 1728518 | 1655699 | 1359157 | 808060 | 471492 |
| 49 | Utah | 970919 | 373021 |  | 189758 | 150615 | 128780 | 77166 | 51579 |
| 50 | Vermont | 231536 | 58160 |  | 81757 |  | 45629 | 29108 | 16882 |
| 51 | Virginia | 2955778 | 358889 | 541336 | 540133 | 558813 | 481101 | 302705 | 172801 |
| 53 | Washington | 2586183 | 810644 |  | 456854 | 465657 | 430840 | 265857 | 156331 |
| 54 | West Virginia | 693184 | 182487 |  | 115535 | 123637 | 130675 | 140850 |  |
| 55 | Wisconsin | 2098717 | 606362 |  | 348215 | 401205 | 376796 | 366139 |  |
| 56 | Wyoming | 215014 | 67982 |  | 35203 | 36454 | 40058 | 22867 | 12450 |

Table E-3. Population Totals-State by Gender by Age Category (Female)

| STATE |  | TOTAL | $\mathbf{1 8 - 2 4}$ | $\mathbf{2 5 - 3 4}$ | $\mathbf{3 5 - 4 4}$ | $\mathbf{4 5 - 5 4}$ | $\mathbf{5 5 - 6 4}$ | $\mathbf{6 5 - 7 4}$ |
| :--- | :--- | ---: | :---: | ---: | ---: | ---: | ---: | ---: |
| $\mathbf{0 1}$ | Alabama | 1900985 | 530207 | 316905 | 334685 | 321119 | $\mathbf{2 2 3 8 1 7}$ | $\mathbf{1 7 4 2 5 2}$ |
| $\mathbf{0 2}$ | Alaska | 254575 | 86530 | 43320 | 50478 | 40826 | 21518 | $\mathbf{1 1 9 0 3}$ |
| $\mathbf{0 4}$ | Arizona | 2501082 | 725131 | 413973 | 416084 | 407155 | 308809 | $\mathbf{2 2 9 9 3 0}$ |
| $\mathbf{0 5}$ | Arkansas | 1126549 | 315540 | 185763 | 194342 | 188737 | 137293 | 104874 |
| $\mathbf{0 6}$ | California | 14526435 | 1813746 | 2696913 | 2565848 | 2589362 | 2254722 | 1424015 |
| $\mathbf{0 8}$ | Colorado | 1976224 | 222693 | 370727 | 351312 | 355625 | 331830 | 196882 |
| $\mathbf{0 9}$ | Connecticut | 1405321 | 352848 | 228263 | 284467 | 245950 | 1547421 | 139372 |
| $\mathbf{1 0}$ | Delaware | 367480 | 98905 | 58596 | 68677 | 62699 | 45507 | 33096 |
| $\mathbf{1 1}$ | DC | 266401 | 105737 | 44620 | 37155 | 36627 | 22526 | 19736 |
| $\mathbf{1 2}$ | Florida | 7900074 | 820327 | 1193424 | 1211304 | 1388940 | 1322156 | 1049467 |
| $\mathbf{1 3}$ | Georgia | 3809699 | 456325 | 673890 | 712926 | 702498 | 608736 | 388340 |


| STATE |  | TOTAL | 18-24 25-34 | 35-44 | 45-54 | 55-64 | 65-74 | 75+ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 15 | Hawaii | 530853 | 150523 | 85225 | 88426 | 89141 | 62229 | 55309 |
| 16 | Idaho | 588274 | 175614 | 95831 | 101905 | 99216 | 66305 | 49403 |
| 17 | Illinois | 4958207 | 567941883249 | 843415 | 904282 | 814680 | 509310 | 435330 |
| 18 | Indiana | 2485309 | 704174 | 414961 | 451179 | 423871 | 269787 | 221337 |
| 19 | Iowa | 1160801 | 322097 | 180207 | 205738 | 201001 | 128104 | 123654 |
| 20 | Kansas | 1071113 | 311808 |  |  | 181719 | 113506 | 103276 |
| 21 | Kentucky | 1687816 | 458217 | 283023 | 311265 | 294817 | 193210 | 147284 |
| 22 | Louisiana | 1781585 | 547968 | 289745 | 313956 | 300512 | 184404 | 145000 |
| 23 | Maine | 534426 | 120210 | 80843 | 103898 | 105232 | 67697 | 56546 |
| 24 | Maryland | 2337440 | 652726 | 400522 | 456728 | 395001 | 243673 | 188790 |
| 25 | Massachusetts | 2653474 | 723296 | 431854 | 509765 | 448045 | 288819 | 251695 |
| 26 | Michigan | 3858057 | 1034979 | 613240 | 717677 | 694526 | 433945 | 363690 |
| 27 | Minnesota | 2052338 | 583696 | 334459 | 386456 | 348378 | 211118 | 188231 |
| 28 | Mississippi | 1146553 | 332090 | 195393 | 199500 | 191835 | 128441 | 99294 |
| 29 | Missouri | 2328568 | 658943 | 362917 | 423066 | 400397 | 267220 | 216025 |
| 30 | Montana | 386605 | 106051 | 55053 | 67920 | 74077 | 46678 | 36826 |
| 31 | Nebraska | 690560 | 203131 | 111703 | 119836 | 116952 | 72456 | 66482 |
| 32 | Nevada | 1052274 | 309575 | 189588 | 182388 | 172307 | 121415 | 77001 |
| 33 | New Hamp. | 516862 | 124416 | 82849 | 107531 | 96542 | 59390 | 46134 |
| 34 | New Jersey | 3495125 | 349695560971 | 602207 | 687323 | 579824 | 377383 | 337722 |
| 35 | New Mexico | 789106 | 226734 | 124879 | 135450 | 139319 | 94444 | 68280 |
| 36 | New York | 7800779 | 8643141387688 | 1283253 | 1433514 | 1277876 | 827695 | 726439 |
| 37 | North Carolina | 3840535 | 424203640861 | 672514 | 695854 | 642341 | 436563 | 328199 |
| 38 | North Dakota | 264277 | 84092 | 38857 | 44318 | 44583 | 25826 | 26601 |
| 39 | Ohio | 4487574 | 488392718277 | 710228 | 828630 | 794815 | 510184 | 437048 |
| 40 | Oklahoma | 1446896 | 435040 | 238457 | 245123 | 237718 | 166197 | 124361 |
| 41 | Oregon | 1530044 | 424640 | 253551 | 258558 | 275099 | 180364 | 137832 |
| 42 | Pennsylvania | 5023337 | 521310783361 | 765686 | 930922 | 889129 | 582815 | 550114 |
| 44 | Rhode Island | 414223 | 111247 | 64304 | 78680 | 71935 | 45177 | 42880 |
| 45 | South Carolina | 1877435 | 516675 |  |  | 327260 | 232474 | 163047 |
| 46 | South Dakota | 304700 | 86130 | 47339 | 53705 | 54124 | 33137 | 30265 |
| 47 | Tennessee | 2533433 | 701849 | 428893 | 456511 | 432287 | 295014 | 218879 |
| 48 | Texas | 9687609 | 12424901857330 | 1791968 | 1731319 | 1474395 | 911088 | 679019 |
| 49 | Utah | 988951 | 369170 | 182748 | 152039 | 135089 | 83269 | 66636 |
| 50 | Vermont | 245571 | 58014 | 36024 | 48820 | 48242 | 31250 | 23221 |
| 51 | Virginia | 3203851 | 349446568127 | 549667 | 602891 | 530205 | 342904 | 260611 |
| 53 | Washington | 2656504 | 778420 | 454773 | 467619 | 457109 | 287048 | 211535 |
| 54 | West Virginia | 731830 | 181762 |  |  | 139664 | 92509 | 76382 |
| 55 | Wisconsin | 2191264 | 599334 | 346905 | 415164 | 381384 | 236584 | 211893 |
| 56 | Wyoming | 214283 | 66274 |  |  | 39127 | 23233 | 16638 |

Table E-4. Population Totals—State by Race/Ethnicity

| State |  | TOTAL | HISPANIC* | NONHISP WHITE | NON-HISP BLACK* | OTHER* |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 01 | Alabama | 3610627 |  | 2493755 | 905966 | 210906 |
| 02 | Alaska | 520362 |  | 348729 |  | 171633 |
| 04 | Arizona | 4868709 | 1257945 | 3022176 |  | 588588 |
| 05 | Arkansas | 2171801 |  | 1671446 | 308988 | 191367 |
| 06 | California | 28385573 | 9743046 | 12137694 | 1566637 | 4938196 |
| 08 | Colorado | 3913166 | 698651 | 2867425 |  | 347090 |
| 09 | Connecticut | 2695810 | 342534 | 2110733 | 242543 |  |
| 10 | Delaware | 697405 |  | 473194 | 136217 | 87994 |
| 11 | District Of Columbia | 495709 | 47724 | 192624 | 225645 | 29716 |
| 12 | Florida | 15114109 | 3386074 | 9005504 | 2089073 | 633458 |
| 13 | Georgia | 7248363 | 552191 | 4204835 | 2125484 | 365853 |
| 15 | Hawaii | 1055297 | 81851 | 266030 |  | 707416 |
| 16 | Idaho | 1157828 | 109859 | 1047969 |  |  |
| 17 | Illinois | 9568143 | 1366092 | 6327885 | 1264026 | 610140 |
| 18 | Indiana | 4801353 | 250131 | 4156669 | 394553 |  |
| 19 | lowa | 2268984 |  | 2043433 |  | 225551 |
| 20 | Kansas | 2097969 |  | 1687935 |  | 410034 |
| 21 | Kentucky | 3262126 |  | 2862996 | 235044 | 164086 |
| 22 | Louisiana | 3389340 |  | 2118508 | 1010053 | 260779 |
| 23 | Maine | 1033864 |  | 984406 |  | 49458 |
| 24 | Maryland | 4445794 | 355530 | 2481709 | 1245093 | 363462 |
| 25 | Massachusetts | 5063059 | 454947 | 3920605 | 297272 | 390235 |
| 26 | Michigan | 7432716 |  | 5845555 | 960861 | 626300 |
| 27 | Minnesota | 4014383 |  | 3417563 |  | 596820 |
| 28 | Mississippi | 2164026 |  | 1309798 | 765797 | 88431 |
| 29 | Missouri | 4475960 |  | 3708514 | 471608 | 295838 |
| 30 | Montana | 763881 |  | 683532 |  | 80349 |
| 31 | Nebraska | 1354789 | 107044 | 1141426 |  | 106319 |
| 32 | Nevada | 2092330 | 493819 | 1187377 | 160172 | 250962 |
| 33 | New Hampshire | 1011630 |  | 941635 |  | 69995 |
| 34 | New Jersey | 6698690 | 1166485 | 4018404 | 811367 | 702434 |
| 35 | New Mexico | 1537624 | 665341 | 677119 |  | 195164 |
| 36 | New York | 14860531 | 2528959 | 8784040 | 2038153 | 1509379 |
| 37 | North Carolina | 7315275 | 518270 | 4962029 | 1485002 | 349974 |
| 38 | North Dakota | 536639 |  | 478671 |  | 57968 |
| 39 | Ohio | 8620784 |  | 7136585 | 953075 | 531124 |
| 40 | Oklahoma | 2795584 |  | 2011053 | 186758 | 597773 |
| 41 | Oregon | 2985913 |  | 2423098 |  | 562815 |
| 42 | Pennsylvania | 9643121 | 497786 | 7828048 | 925814 | 391473 |


| STATE |  | TOTAL | HISPANIC* |  | NON-HISP BLACK* | OTHER* |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 44 | Rhode Island | 798755 | 92477 | 622431 |  | 83847 |
| 45 | South Carolina | 3561171 |  | 2382906 | 926037 | 252228 |
| 46 | South Dakota | 605347 |  | 525114 |  | 80233 |
| 47 | Tennessee | 4853400 |  | 3769528 | 756307 | 327565 |
| 48 | Texas | 18838550 | 6542207 | 9064546 | 2121004 | 1110793 |
| 49 | Utah | 1959870 | 229656 | 1730214 |  |  |
| 50 | Vermont | 477107 |  | 455473 |  | 21634 |
| 51 | Virginia | 6159629 | 466632 | 4084304 | 1113227 | 495466 |
| 53 | Washington | 5242687 | 497945 | 3912084 |  | 832658 |
| 54 | West Virginia | 1425014 |  | 1340693 |  | 84321 |
| 55 | Wisconsin | 4289981 |  | 3679300 |  | 610681 |
| 56 | Wyoming | 429297 |  | 374568 |  | 54729 |

Table E-5. Population Totals—State by Marital Status

| STATE |  | TOTAL | MARRIED | SINGLE, NEVER <br> MARRIED | DIVORCED, WIDOWED, SEPARATED |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 01 | Alabama | 3610627 | 1840107 | 930581 | 839939 |
| 02 | Alaska | 520362 | 268688 | 156548 | 95126 |
| 04 | Arizona | 4868709 | 2475721 | 1378883 | 1014105 |
| 05 | Arkansas | 2171801 | 1181378 | 479064 | 511359 |
| 06 | California | 28385573 | 14087543 | 9206030 | 5092000 |
| 08 | Colorado | 3913166 | 2117529 | 1052847 | 742790 |
| 09 | Connecticut | 2695810 | 1402098 | 777325 | 516387 |
| 10 | Delaware | 697405 | 352933 | 200451 | 144021 |
| 11 | District Of Columbia | 495709 | 148800 | 259922 | 86987 |
| 12 | Florida | 15114109 | 7399862 | 4157483 | 3556764 |
| 13 | Georgia | 7248363 | 3644400 | 2104166 | 1499797 |
| 15 | Hawaii | 1055297 | 565687 | 309205 | 180405 |
| 16 | Idaho | 1157828 | 686569 | 239192 | 232067 |
| 17 | Illinois | 9568143 | 4948406 | 2899396 | 1720341 |
| 18 | Indiana | 4801353 | 2576752 | 1200856 | 1023745 |
| 19 | lowa | 2268984 | 1303170 | 531325 | 434489 |
| 20 | Kansas | 2097969 | 1202773 | 484965 | 410231 |
| 21 | Kentucky | 3262126 | 1762427 | 751616 | 748083 |
| 22 | Louisiana | 3389340 | 1600718 | 1021774 | 766848 |
| 23 | Maine | 1033864 | 549466 | 245983 | 238415 |
| 24 | Maryland | 4445794 | 2236659 | 1373443 | 835692 |
| 25 | Massachusetts | 5063059 | 2578731 | 1567783 | 916545 |


| STATE |  | TOTAL | MARRIED | SINGLE, NEVER <br> MARRIED | DIVORCED, WIDOWED, SEPARATED |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 26 | Michigan | 7432716 | 3820137 | 2094362 | 1518217 |
| 27 | Minnesota | 4014383 | 2242964 | 1080950 | 690469 |
| 28 | Mississippi | 2164026 | 1048251 | 619750 | 496025 |
| 29 | Missouri | 4475960 | 2403264 | 1134093 | 938603 |
| 30 | Montana | 763881 | 415659 | 182076 | 166146 |
| 31 | Nebraska | 1354789 | 774902 | 333458 | 246429 |
| 32 | Nevada | 2092330 | 1026518 | 594481 | 471331 |
| 33 | New Hampshire | 1011630 | 571370 | 243048 | 197212 |
| 34 | New Jersey | 6698690 | 3533028 | 1976873 | 1188789 |
| 35 | New Mexico | 1537624 | 738206 | 474205 | 325213 |
| 36 | New York | 14860531 | 7097091 | 5051135 | 2712305 |
| 37 | North Carolina | 7315275 | 3802565 | 1974647 | 1538063 |
| 38 | North Dakota | 536639 | 303088 | 141548 | 92003 |
| 39 | Ohio | 8620784 | 4459678 | 2322734 | 1838372 |
| 40 | Oklahoma | 2795584 | 1514381 | 649298 | 631905 |
| 41 | Oregon | 2985913 | 1571018 | 776643 | 638252 |
| 42 | Pennsylvania | 9643121 | 4993744 | 2749473 | 1899904 |
| 44 | Rhode Island | 798755 | 388695 | 245550 | 164510 |
| 45 | South Carolina | 3561171 | 1797774 | 974131 | 789266 |
| 46 | South Dakota | 605347 | 346151 | 145616 | 113580 |
| 47 | Tennessee | 4853400 | 2564837 | 1196725 | 1091838 |
| 48 | Texas | 18838550 | 10024547 | 5124872 | 3689131 |
| 49 | Utah | 1959870 | 1192857 | 460272 | 306741 |
| 50 | Vermont | 477107 | 252542 | 124802 | 99763 |
| 51 | Virginia | 6159629 | 3293008 | 1674849 | 1191772 |
| 53 | Washington | 5242687 | 2821088 | 1403273 | 1018326 |
| 54 | West Virginia | 1425014 | 754091 | 342184 | 328739 |
| 55 | Wisconsin | 4289981 | 2348444 | 1163379 | 778158 |
| 56 | Wyoming | 429297 | 246960 | 97025 | 85312 |

Table E-6. Population Totals—State by Educational Attainment

| STATE |  | TOTAL | LT HS | HS GRAD | SOME <br> COLLEGE | COLLEGE <br> GRAD | POST <br> GRAD |
| :--- | :--- | ---: | ---: | ---: | ---: | ---: | ---: |
| $\mathbf{0 1}$ | Alabama | 3610627 | 548922 | 1129878 | 1137626 | 507540 | 286661 |
| $\mathbf{0 2}$ | Alaska | 520362 | 48622 | 145407 | 191094 | 87410 | 47829 |
| $\mathbf{0 4}$ | Arizona | 4868709 | 703314 | 1233611 | 1694006 | 789440 | 448338 |
| $\mathbf{0 5}$ | Arkansas | 2171801 | 331004 | 767086 | 651130 | 277381 | 145200 |
| $\mathbf{0 6}$ | California | 28385573 | 4980386 | 6176658 | 9102346 | 5218751 | 2907432 |
| $\mathbf{0 8}$ | Colorado | 3913166 | 394659 | 846348 | 1299314 | 883557 | 489288 |


| State |  | TOTAL | LT HS | HS GRAD | $\begin{gathered} \text { SOME } \\ \text { COLLEGE } \end{gathered}$ | college GRAD | $\begin{aligned} & \text { POST } \\ & \text { GRAD } \end{aligned}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 09 | Connecticut | 2695810 | 279645 | 740941 | 711894 | 545311 | 418019 |
| 10 | Delaware | 697405 | 83048 | 220494 | 196709 | 117691 | 79463 |
| 11 | District Of Columbia | 495709 | 49801 | 95404 | 85893 | 117745 | 146866 |
| 12 | Florida | 15114109 | 2001133 | 4456680 | 4801257 | 2523805 | 1331234 |
| 13 | Georgia | 7248363 | 1057564 | 2084835 | 2195743 | 1220313 | 689908 |
| 15 | Hawaii | 1055297 | 89582 | 289020 | 367111 | 212045 | 97539 |
| 16 | Idaho | 1157828 | 127511 | 329749 | 420704 | 195309 | 84555 |
| 17 | Illinois | 9568143 | 1143881 | 2582491 | 2933523 | 1830004 | 1078244 |
| 18 | Indiana | 4801353 | 617059 | 1631455 | 1479452 | 701372 | 372015 |
| 19 | lowa | 2268984 | 195170 | 734667 | 776656 | 398581 | 163910 |
| 20 | Kansas | 2097969 | 209360 | 552441 | 731906 | 394743 | 209519 |
| 21 | Kentucky | 3262126 | 519008 | 1067716 | 982012 | 410689 | 282701 |
| 22 | Louisiana | 3389340 | 572118 | 1128585 | 972642 | 485893 | 230102 |
| 23 | Maine | 1033864 | 81947 | 354299 | 323743 | 181374 | 92501 |
| 24 | Maryland | 4445794 | 469597 | 1168537 | 1247463 | 865639 | 694558 |
| 25 | Massachusetts | 5063059 | 505525 | 1318579 | 1302528 | 1111424 | 825003 |
| 26 | Michigan | 7432716 | 799746 | 2162195 | 2600886 | 1179382 | 690507 |
| 27 | Minnesota | 4014383 | 335499 | 1038232 | 1370642 | 871684 | 398326 |
| 28 | Mississippi | 2164026 | 379646 | 650278 | 724388 | 265830 | 143884 |
| 29 | Missouri | 4475960 | 486550 | 1421741 | 1416244 | 745001 | 406424 |
| 30 | Montana | 763881 | 62756 | 214092 | 280772 | 140960 | 65301 |
| 31 | Nebraska | 1354789 | 128829 | 358089 | 484212 | 263104 | 120555 |
| 32 | Nevada | 2092330 | 317570 | 611829 | 731489 | 294098 | 137344 |
| 33 | New Hampshire | 1011630 | 75965 | 295305 | 303585 | 217742 | 119033 |
| 34 | New Jersey | 6698690 | 757485 | 1940099 | 1685335 | 1463489 | 852282 |
| 35 | New Mexico | 1537624 | 245560 | 413588 | 510451 | 205878 | 162147 |
| 36 | New York | 14860531 | 2095027 | 3942457 | 4026367 | 2814884 | 1981796 |
| 37 | North Carolina | 7315275 | 1050003 | 1958690 | 2366435 | 1281982 | 658165 |
| 38 | North Dakota | 536639 | 45428 | 141497 | 210579 | 105612 | 33523 |
| 39 | Ohio | 8620784 | 947413 | 2921696 | 2627525 | 1363217 | 760933 |
| 40 | Oklahoma | 2795584 | 380537 | 892427 | 900264 | 427927 | 194429 |
| 41 | Oregon | 2985913 | 322064 | 745776 | 1078097 | 533310 | 306666 |
| 42 | Pennsylvania | 9643121 | 1033540 | 3464893 | 2503825 | 1639635 | 1001228 |
| 44 | Rhode Island | 798755 | 105196 | 209924 | 235892 | 157107 | 90636 |
| 45 | South Carolina | 3561171 | 519118 | 1043565 | 1140541 | 552496 | 305451 |
| 46 | South Dakota | 605347 | 54083 | 192840 | 209164 | 109984 | 39276 |
| 47 | Tennessee | 4853400 | 677921 | 1626810 | 1424342 | 723917 | 400410 |
| 48 | Texas | 18838550 | 3329929 | 4891444 | 5844845 | 3222972 | 1549360 |
| 49 | Utah | 1959870 | 176662 | 470962 | 772124 | 364384 | 175738 |
| 50 | Vermont | 477107 | 41495 | 146801 | 133689 | 95502 | 59620 |
| 51 | Virginia | 6159629 | 709080 | 1569800 | 1782085 | 1248342 | 850322 |


| STATE |  | TOTAL | LT HS | HS GRAD | SOME | COLLEGE | POST |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  | COLLEGE | GRAD | GRAD |
| 53 | Washington | 5242687 | 544654 | 1248011 | 1842911 | 1047138 | 559973 |
| 54 | West Virginia | 1425014 | 214544 | 576169 | 382736 | 153962 | 97603 |
| 55 | Wisconsin | 4289981 | 411909 | 1358297 | 1398705 | 767707 | 353363 |
| 56 | Wyoming | 429297 | 29586 | 122891 | 169488 | 73980 | 33352 |

Table E-7. Population Totals—State by Phone Status

| STATE |  | TOTAL 18+ | CELL-ONLY | DUAL-USER | LANDLINE- |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 01 | Alabama | 3610627 | 1369675 | 1952987 | 287964 |
| 02 | Alaska | 520362 | 167995 | 330707 | 21660 |
| 04 | Arizona | 4868709 | 2289690 | 2125072 | 453947 |
| 05 | Arkansas | 2171801 | 1211802 | 845339 | 114660 |
| 06 | California | 28385573 | 10511036 | 16113072 | 1761465 |
| 08 | Colorado | 3913166 | 1784883 | 1904674 | 223609 |
| 09 | Connecticut | 2695810 | 684867 | 1765374 | 245570 |
| 10 | Delaware | 697405 | 185127 | 481188 | 31090 |
| 11 | District Of Columbia | 495709 | 239448 | 229769 | 26492 |
| 12 | Florida | 15114109 | 6658336 | 7314791 | 1140982 |
| 13 | Georgia | 7248363 | 3122372 | 3709675 | 416316 |
| 15 | Hawaii | 1055297 | 383353 | 596566 | 75378 |
| 16 | Idaho | 1157828 | 628399 | 472194 | 57236 |
| 17 | Illinois | 9568143 | 3983472 | 5106264 | 478407 |
| 18 | Indiana | 4801353 | 2049237 | 2306629 | 445486 |
| 19 | Iowa | 2268984 | 1106595 | 1050800 | 111589 |
| 20 | Kansas | 2097969 | 943440 | 1001597 | 152932 |
| 21 | Kentucky | 3262126 | 1350540 | 1609226 | 302360 |
| 22 | Louisiana | 3389340 | 1342553 | 1797009 | 249777 |
| 23 | Maine | 1033864 | 403459 | 552655 | 77750 |
| 24 | Maryland | 4445794 | 1361327 | 2826675 | 257793 |
| 25 | Massachusetts | 5063059 | 1337509 | 3361707 | 363843 |
| 26 | Michigan | 7432716 | 3282275 | 3655434 | 495007 |
| 27 | Minnesota | 4014383 | 1586987 | 2186696 | 240700 |
| 28 | Mississippi | 2164026 | 1134172 | 896684 | 133171 |
| 29 | Missouri | 4475960 | 1969422 | 2203550 | 302988 |
| 30 | Montana | 763881 | 308702 | 351228 | 103951 |
| 31 | Nebraska | 1354789 | 540812 | 720163 | 93814 |
| 32 | Nevada | 2092330 | 920198 | 950089 | 222043 |
| 33 | New Hampshire | 1011630 | 279462 | 678545 | 53624 |
| 34 | New Jersey | 6698690 | 1436406 | 4887865 | 374419 |
| 35 | New Mexico | 1537624 | 714067 | 642660 | 180897 |


| STATE |  | TOTAL 18+ | CELL-ONLY | DUAL-USER | LANDLINEONLY |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  |
| 36 | New York | 14860531 | 4128769 | 9411164 | 1320599 |
| 37 | North Carolina | 7315275 | 2749766 | 3960261 | 605247 |
| 38 | North Dakota | 536639 | 252149 | 217067 | 67422 |
| 39 | Ohio | 8620784 | 3531941 | 4590634 | 498208 |
| 40 | Oklahoma | 2795584 | 1307842 | 1287853 | 199889 |
| 41 | Oregon | 2985913 | 1291864 | 1435066 | 258982 |
| 42 | Pennsylvania | 9643121 | 2837945 | 5950847 | 854329 |
| 44 | Rhode Island | 798755 | 233207 | 506230 | 59318 |
| 45 | South Carolina | 3561171 | 1572607 | 1725854 | 262709 |
| 46 | South Dakota | 605347 | 192301 | 338846 | 74200 |
| 47 | Tennessee | 4853400 | 2056610 | 2473893 | 322898 |
| 48 | Texas | 18838550 | 9322963 | 8263536 | 1252051 |
| 49 | Utah | 1959870 | 996951 | 880840 | 82078 |
| 50 | Vermont | 477107 | 151939 | 251134 | 74034 |
| 51 | Virginia | 6159629 | 2256436 | 3551215 | 351979 |
| 53 | Washington | 5242687 | 2253765 | 2677688 | 311234 |
| 54 | West Virginia | 1425014 | 472073 | 731566 | 221376 |
| 55 | Wisconsin | 4289981 | 1792239 | 2098979 | 398762 |
| 56 | Wyoming | 429297 | 208078 | 195374 | 25845 |

## Table E-5. Population Totals-State by Housing type

1) Single unit, attached: Collapse with Single unit, detached or other
2) Multi, 2 units: Collapse with Multi, 3-9 units
3) Multi, 3-9 units: Collapse priority 1) Multi, 2 units 2) Multi, 10-49
4) Multi, 10-49 units: Collapse with Multi, 3-9 units
5) Multi, 50+ units: Collapse priority 1) Multi, 10-49 units 2) Multi, 3-9 units 3) Multi, 2 units
6) Mobile home, boat, RV, or van: Collapse with Single unit, detached or other
7) Collapse any remaining small cells Single unit, detached or other

| STATE |  | TOTAL | SINGLE, DETACHED/ OTHER | SINGLE, ATTACHED | MULTI, 2 UNITS | MULTI, 39 UNITS | MULTI, 1049 UNITS | MULTI, 50+ <br> UNITS | MOBILE HOME, BOAT, RV, OR VAN* |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 01 | Alabama | 3610627 | 3610627 |  |  |  |  |  |  |
| 02 | Alaska | 520362 | 409802 |  | 110560 |  |  |  |  |
| 04 | Arizona | 4868709 | 4077729 |  | 790980 |  |  |  |  |
| 05 | Arkansas | 2171801 | 1890163 |  |  |  |  |  | 281638 |
| 06 | California | 28385573 | 19175545 | 1896382 |  | 401 | 2399166 | 1369079 |  |
| 08 | Colorado | 3913166 | 3129859 |  | 783307 |  |  |  |  |
| 09 | Connecticut | 2695810 | 1947879 |  | 532823 |  | 215108 |  |  |
| 10 | Delaware | 697405 | 516072 | 94260 | 87073 |  |  |  |  |
| 11 | DC | 495709 | 229017 |  | 87976 |  | 178716 |  |  |
| 12 | Florida | 15114109 | 9621177 | 953788 |  | 018 | 1286476 | 662332 | 1184318 |
| 13 | Georgia | 7248363 | 5447092 |  | 611357 |  | 566731 |  | 623183 |
| 15 | Hawaii | 1055297 | 769437 |  | 285860 |  |  |  |  |
| 16 | Idaho | 1157828 | 1023961 |  | 133867 |  |  |  |  |
| 17 | Illinois | 9568143 | 6484016 | 533127 | 157 | 614 | 576669 | 403717 |  |
| 18 | Indiana | 4801353 | 4144088 |  | 657265 |  |  |  |  |
| 19 | Iowa | 2268984 | 1947061 |  | 321923 |  |  |  |  |
| 20 | Kansas | 2097969 | 1831716 |  | 266253 |  |  |  |  |
| 21 | Kentucky | 3262126 | 2820782 |  | 441344 |  |  |  |  |
| 22 | Louisiana | 3389340 | 2922931 |  | 466409 |  |  |  |  |
| 23 | Maine | 1033864 | 855227 |  | 178637 |  |  |  |  |
| 24 | Maryland | 4445794 | 2634439 | 953767 | 857588 |  |  |  |  |
| 25 | Massachusetts | 5063059 | 3205101 |  | 515501792339 |  |  | 550118 |  |
| 26 | Michigan | 7432716 | 6430567 |  | 540121 |  | 462028 |  |  |
| 27 | Minnesota | 4014383 | 3318420 |  | 695963 |  |  |  |  |
| 28 | Mississippi | 2164026 | 2164026 |  |  |  |  |  |  |
| 29 | Missouri | 4475960 | 3827094 |  | 396269 |  | 252597 |  |  |
| 30 | Montana | 763881 | 658050 |  | 105831 |  |  |  |  |
| 31 | Nebraska | 1354789 | 1156762 |  | 198027 |  |  |  |  |


| STATE |  | TOTAL | $\begin{array}{r} \text { SINGLE, } \\ \text { DETACHED/ } \\ \text { OTHER } \end{array}$ | SINGLE, ATTACHED | MULTI, 2 UNITS | MULTI, 39 UNITS | MULTI, 1049 UNITS | MULTI, 50+ UNITS | MOBILE HOME, BOAT, RV, OR VAN* |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 32 | Nevada | 2092330 | 1622508 |  | 469822 |  |  |  |  |
| 33 | New Hamp. | 1011630 | 786187 |  | 151318 |  | 74125 |  |  |
| 34 | New Jersey | 6698690 | 4081638 | 562430 | 1294124 |  | 760498 |  |  |
| 35 | New Mexico | 1537624 | 1365596 |  | 172028 |  |  |  |  |
| 36 | New York | 14860531 | 7057488 | 889958 | 1596120 | 1722172 | 1665326 | 1929467 |  |
| 37 | North Carolina | 7315275 | 5342387 |  | 535947 |  | 469710 |  | 967231 |
| 38 | North Dakota | 536639 | 422717 |  | 113922 |  |  |  |  |
| 39 | Ohio | 8620784 | 7152678 |  | 907357 |  | 560749 |  |  |
| 40 | Oklahoma | 2795584 | 2479003 |  | 316581 |  |  |  |  |
| 41 | Oregon | 2985913 | 2405930 |  | 579983 |  |  |  |  |
| 42 | Pennsylvania | 9643121 | 6337454 | 1855452 | 367071 | 528997 | 5541 |  |  |
| 44 | Rhode Island | 798755 | 522465 |  | 217929 |  | 58361 |  |  |
| 45 | South Carolina | 3561171 | 2520459 |  | 444802 |  |  |  | 595910 |
| 46 | South Dakota | 605347 | 515876 |  | 89471 |  |  |  |  |
| 47 | Tennessee | 4853400 | 4171006 |  | 682394 |  |  |  |  |
| 48 | Texas | 18838550 | 13893507 |  | 1513193 |  | 20702 |  | 1361607 |
| 49 | Utah | 1959870 | 1631541 |  | 328329 |  |  |  |  |
| 50 | Vermont | 477107 | 382921 |  | 94186 |  |  |  |  |
| 51 | Virginia | 6159629 | 4353340 | 719226 |  | 382 | 6286 |  |  |
| 53 | Washington | 5242687 | 4140568 |  | 1102119 |  |  |  |  |
| 54 | West Virginia | 1425014 | 1089314 |  | 117411 |  |  |  | 218289 |
| 55 | Wisconsin | 4289981 | 3382334 |  | 575782 |  | 331865 |  |  |
| 56 | Wyoming | 429297 | 380799 |  | 48498 |  |  |  |  |

* Mobile home, boat, rv, or van collapsed with single, detached/ other


## Appendix F: Codebook

| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | LASTDATE | num | 8 | INTERVIEW DATE |  | From call history |  |
| 1 | GENHEALTH | num | 3 | WOULD YOU SAY THAT IN GENERAL YOUR HEALTH IS...? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { EXCELLENT } \\ & 2=\text { VERY GOOD } \\ & 3=\text { GOOD } \\ & 4=\text { FAIR } \\ & 5=\text { POOR } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 2 | AGE | num | 4 | WHAT IS YOUR AGE? | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 3 | SMOK100 | num | 3 | HAVE YOU SMOKED AT LEAST 100 CIGARETTES IN YOUR ENTIRE LIFE? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 4 | SMOKNOW | num | 3 | DO YOU NOW SMOKE CIGARETTES...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { EVERY DAY } \\ & 2=\text { SOME DAYS } \\ & 3=\text { NOT AT ALL } \end{aligned}$ | Questionnaire | $\begin{aligned} & \text { /ASK IF Q2 AGE EQ } \\ & \text { (18-29) OR Q3 } \\ & \text { SMOK100 EQ 1/ } \end{aligned}$ |
| 5 | SMOKTYPE | num | 3 | WHEN YOU SMOKE CIGARETTES, DO YOU USUALLY SMOKE....? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { PREMADE CIGARETTES } \\ & 2=\text { ROLL-YOUR-OWN } \\ & 3=\text { BOTH } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW $\text { EQ }(1,2) /$ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 6 | SMOKMENTHREG | num | 3 | HAVE YOU EVER SMOKED MENTHOL CIGARETTES FOR 6 MONTHS OR MORE? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q3 SMOK100 EQ 1/ |
| 7 | SMOKMENTHNOW | num | 3 | CURRENTLY, WHEN YOU <br> SMOKE CIGARETTES, HOW <br> OFTEN DO YOU SMOKE <br> MENTHOL CIGARETTES...? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { ALL OF THE TIME } \\ & 2=\text { MOST OF THE TIME } \\ & 3=\text { SOME OF THE TIME } \\ & 4=\text { RARELY } \\ & 5=\text { NEVER } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ (1,2)/ |
| 8 | SMOKPERDAY | num | 8 | ON AVERAGE, ABOUT HOW MANY CIGARETTES DO YOU NOW SMOKE EACH DAY? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 666=\text { LESS THAN } 1 \\ & \text { CIGARETTE A DAY } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ 1/ |
| 9 | SMOKDAYS30 | num | 8 | ON HOW MANY OF THE PAST 30 DAYS DID YOU SMOKE CIGARETTES? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ $2 /$ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 10 | CIGBRAND <br> (This was an openended question in 20122013 and a character variable.) | num | 3 | DURING THE PAST 30 <br> DAYS, WHAT BRAND OF <br> CIGARETTES DID YOU BUY <br> MOST OFTEN? | $-1=$ INAPPLICABLE $-7=$ REFUSED $-8=$ DK -9 = NOT ASCERTAINED 1: BASIC (BRANDED DISCOUNT) 2: CAMEL 3: DORAL (BRANDED DISCOUNT) 4: KOOL 5: MARLBORO GOLD 6: MARLBORO MENTHOL 7: MARLBORO RED 8: MARLBORO (OTHER) 9: NEWPORT BOX 10: NEWPORT MENTHOL BLUE 11: NEWPORT MENTHOL GOLD 12: NEWPORT (OTHER) 13: PALL MALL 14: SALEM 15: VIRGINIA SLIMS 16: WINSTON 66: DID NOT BUY ONE BRAND MOST OFTEN DURING THE PAST 30 DAYS 88: DID NOT BUY ANY CIGARETTE DURING THE PAST 30 DAYS 96: OTHER (SPECIFY) | Questionnaire | /ASK IF SMOKNOW EQ 1 OR $2 /$ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 10 | CIGBRAND_OTH | char | 50 | DURING THE PAST 30 <br> DAYS, WHAT BRAND OF CIGARETTES DID YOU BUY MOST OFTEN-SPECIFY | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q10 CIGARBRAND EQ 96/ |
| 11 | SMOKSOMEDAY | num | 8 | \# OF CIG SMOKED 1 DAY IN PAST 30 DAYS | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 666=\text { LESS THAN } 1 \\ & \text { CIGARETTE A DAY } \end{aligned}$ | Questionnaire | /ASK IF Q9 <br> SMOKDAYS30 EQ 1- <br> 30/ |
| 12 | SMOKLAST1 | num | 8 | HOW LONG HAS IT BEEN SINCE YOU COMPLETELY STOPPED SMOKING CIGARETTES? UNIT | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { DAYS } \\ & 2=\text { WEEKS } \\ & 3=\text { MONTHS } \\ & 4=\text { YEARS } \\ & 666=\text { DATE } \\ & 888=\text { TODAY } \end{aligned}$ | Questionnaire | /ASK IF (Q3 SMOK100 <br> EQ 1 AND <br> Q4 SMOKNOW EQ (3,- <br> 8,-7)) OR (Q4 <br> SMOKNOW EQ 2 AND <br> Q9 SMOKDAYS30 EQ $(0,-7,-8) /$ |
| 12 | SMOKLSD2 | num | 4 | \# OF DAYS SINCE LAST SMOKED CIGARETTE | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q12 <br> SMOKLAST=1/ |
| 12 | SMOKLSM2 | num | 3 | \# OF MONTHS SINCE LAST SMOKED CIGARETTE | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q12 <br> SMOKLAST=3/ |
| 12 | SMOKLSW2 | num | 4 | \# OF WEEKS SINCE LAST SMOKED CIGARETTE | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q12 <br> SMOKLAST=2/ |
| 12 | SMOKLSY2 | num | 3 | \# OF YEARS SINCE LAST SMOKED CIGARETTE | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q12 <br> SMOKLAST=4/ |
| 12 | SMOKL2DD | num | 3 | DATE OF STOPPED SMOKING CIGARETTE (DAY) | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q12 <br> SMOKLAST1=666/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 12 | SMOKL2MM | num | 3 | DATE OF STOPPED SMOKING CIGARETTE (MONTH) | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q12 <br> SMOKLAST1=666/ |
| 12 | SMOKL2YY | num | 4 | DATE OF STOPPED SMOKING CIGARETTE (YEAR) | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q12 <br> SMOKLAST1=666/ |
| 13 | SMOKEVER | num | 3 | HAVE YOU EVER TRIED CIGARETTE SMOKING, EVEN ONE OR TWO PUFFS? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q2 AGE EQ (1829) AND Q3 SMOK100 EQ (2,-8,-7) AND Q4 SMOKNOW EQ (3,-8,-7)) OR (Q2 AGE EQ (-8,-7,30130) AND Q3 SMOK100 EQ (2,-8,-7))/ |
| 14 | SMOKFIRSTAGE | num | 4 | HOW OLD WERE YOU THE FIRST TIME YOU SMOKED PART OR ALL OF A CIGARETTE? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q3 SMOK100 EQ 1 OR (Q2 AGE EQ (18-29) AND Q3 SMOK100 EQ $(2,-8,-7)$ AND Q4 SMOKNOW EQ $(1,2))$ OR Q13 SMOKEVER EQ 1/ |
| 15 | SMOKDLYPAST | num | 3 | HAVE YOU EVER SMOKED CIGARETTES EVERY DAY FOR AT LEAST 6 MONTHS? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q3 SMOK100 EQ <br> 1 OR (Q2 AGE EQ (18-29) <br> AND Q3 SMOK100 EQ <br> ( $2,-8,-7$ ) AND Q4 <br> SMOKNOW EQ $(1,2)$ ) OR Q13 SMOKEVER EQ 1/ |
| 16 | SMOKDLYAGE | num | 4 | HOW OLD WERE YOU <br> WHEN YOU FIRST <br> STARTED SMOKING <br> CIGARETTES EVERY DAY? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ 1 OR Q15 SMOKDLYPAST EQ 1/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 17 | SMOKDLYLAST1 | num | 8 | ABOUT HOW LONG HAS IT BEEN SINCE YOU LAST SMOKED CIGARETTES ON A DAILY BASIS? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { DAYS } \\ & 2=\text { WEEKS } \\ & 3=\text { MONTHS } \\ & 4=\text { YEARS } \\ & 666=\text { DATE } \\ & 888=\text { TODAY } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ 2 AND Q15 SMOKDLYPAST EQ 1/ |
| 17 | SMOKDLD2 | num | 4 | DAYS SINCE LAST <br> SMOKED ON A DAILY BASIS | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q17 <br> SMOKDLYLAST1=1/ |
| 17 | SMOKDLM2 | num | 3 | MTHS SINCE LAST <br> SMOKED ON A DAILY BASIS | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q17 <br> SMOKDLYLAST1=3/ |
| 17 | SMOKDLW2 | num | 4 | WEEKS SINCE LAST SMOKED ON A DAILY BASIS | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q17 <br> SMOKDLYLAST1=2/ |
| 17 | SMOKDLY2 | num | 3 | YEARS SINCE LAST SMOKED ON DAILY BASIS | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q17 <br> SMOKDLYLAST1=4/ |
| 17 | SMOKDLDD | num | 3 | DATE OF DAYS OF LAST SMOKED CIGARETTE | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -8=\text { DK- } 9=\text { NOT } \\ & \text { ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q17 <br> SMOKDLYLAST1=666/ |
| 17 | SMOKDLMM | num | 3 | DATE OF MONTH OF LAST SMOKED CIGARETTE | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q17 <br> SMOKDLYLAST1=666/ |
| 17 | SMOKDLYY | num | 4 | DATE OF YEARS OF LAST SMOKED CIGARETTE | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q17 <br> SMOKDLYLAST1=666/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 18 | SMOKYRAGO | num | 3 | AROUND THIS TIME 12 MONTHS AGO, WERE YOU SMOKING CIGARETTES EVERY DAY, SOME DAYS, OR NOT AT ALL? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { EVERY DAY } \\ & 2=\text { SOME DAYS } \\ & 3=\text { NOT AT ALL } \end{aligned}$ | Questionnaire | /ASK IF Q3 SMOK100 EQ 1 OR (Q2 AGE EQ (18-29) AND Q3 SMOK100 EQ ( $2,-8,-7$ ) AND Q4 SMOKNOW EQ $(1,2)$ ) OR Q13 SMOKEVER EQ 1/ |
| 19 | SUSCEPT1 | num | 3 | HAVE YOU EVER BEEN CURIOUS ABOUT SMOKING <br> A CIGARETTE? WOULD YOU SAY...? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { DEFINITELY YES } \\ & 2=\text { PROBABLY YES } \\ & 3=\text { PROBABLY NOT } \\ & 4=\text { DEFINITELY NOT } \end{aligned}$ | Questionnaire | /ASK IF Q2 AGE EQ (1829) AND Q13 <br> SMOKEVER EQ (2,-8,-7)/ |
| 20 | SUSCEPT2 | num | 3 | DO YOU THINK YOU WILL <br> SMOKE A CIGARETTE <br> SOON? WOULD YOU <br> SAY...? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { DEFINITELY YES } \\ & 2=\text { PROBABLY YES } \\ & 3=\text { PROBABLY NOT } \\ & 4=\text { DEFINITELY NOT } \end{aligned}$ | Questionnaire | /ASK IF Q2 AGE EQ (18- <br> 29) AND Q3 SMOK100 <br> EQ (2,-8,-7) AND Q4 <br> SMOKNOW EQ (3,-8,-7)/ |
| 21 | SUSCEPT3 | num | 3 | DO YOU THINK YOU WILL SMOKE A CIGARETTE IN THE NEXT YEAR? WOULD YOU SAY...? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { DEFINITELY YES } \\ & 2=\text { PROBABLY YES } \\ & 3=\text { PROBABLY NOT } \\ & 4=\text { DEFINITELY NOT } \end{aligned}$ | Questionnaire | /ASK IF Q2 AGE EQ (18- <br> 29) AND Q3 SMOK100 <br> EQ (2,-8,-7) AND Q4 <br> SMOKNOW EQ (3,-8,-7)/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 22 | CIGARPAST | num | 3 | HAVE YOU SMOKED CIGARS, CIGARILLOS, OR LITTLE FILTERED CIGARS AT LEAST 50 TIMES IN YOUR ENTIRE LIFE? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 23 | CIGARNOW | num | 3 | DO YOU NOW SMOKE CIGARS, CIGARILLOS, OR LITTLE FILTERED CIGARS EVERY DAY, SOME DAYS, RARELY, OR NOT AT ALL? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { EVERY DAY } \\ & 2=\text { SOME DAYS } \\ & 3=\text { RARELY } \\ & 4=\text { NOT AT ALL } \end{aligned}$ | Questionnaire | /ASK IF (Q2 AGE EQ (18- <br> 29) AND Q22 <br> CIGARPAST EQ (2,-8)) <br> OR Q22 CIGARPAST EQ 1/ |
| 24 | CIGARTYPE | num | 3 | IS THE SIZE OF THE <br> CIGARS, CIGARILLOS, OR <br> LITTLE FILTERED CIGARS THAT YOU USUALLY SMOKE...? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1 \text { = AROUND THE LENGTH OF } \\ & \text { A CIGARETTE } \\ & 2 \text { = AROUND LENGTH OF } \\ & \text { DOLLAR BILL } \\ & 3 \text { = BETWEEN LENGTH OF } \\ & \text { CIGARETTE AND A DOLLAR } \\ & 4 \text { = DON'T HAVE A USUAL } \\ & \text { SIZE OF CIGAR } \end{aligned}$ | Questionnaire | /ASK IF (Q23 CIGARNOW EQ (1,2,3)/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 25 | CIGARFILT | num | 3 | DO YOU USUALLY SMOKE <br> A CIGAR, CIGARILLO OR <br> LITTLE FILTERED CIGAR <br> THAT HAS...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { A SPONGY FILTER } \\ & 2=\text { A PLASTIC TIP } \\ & 3=\text { A WOODEN TIP } \\ & 4=\text { NO FILTER OR TIP } \end{aligned}$ | Questionnaire | OCT 2013-JAN 2014: <br> /ASK IF (Q23 <br> CIGARNOW EQ $(1,2,3)$ <br> AND Q24 CIGARTYPE <br> EQ (1,2,3,-8)/ FEB-SEPT <br> '14: /ASK IF (Q23 <br> CIGARNOW EQ $(1,2,3)$ <br> AND Q24 CIGARTYPE <br> EQ (1,2,3,4,-8)/ |
| 26 | CIGARBRAND | num | 3 | WHAT IS THE NAME BRAND OF THE CIGAR, CIGARILLO, OR LITTLE FILTERED CIGAR THAT YOU USUALLY SMOKE? | ```\(-1=\) INAPPLICABLE \(-7=\) REFUSED \(-8=\) DK \(-9=\) NOT ASCERTAINED 1: AL CAPONE 2: ARTURO FUENTE 3: BACKWOODS 4: BLACK AND MILD 5: CHEYENNE COHIBA DJARUM DUTCH MASTERS MACANUDO 10: MONTECHRISTO 11: PHILLIES 12: PRIME TIME 13: ROMEO Y JULIETA 14: SMOKER'S CHOICE 15: SWISHER SWEETS 16: WHITE OWL 66: DO NOT HAVE A USUAL BRAND 96: OTHER(SPECIFY)``` | Questionnaire | OCT 2013-JAN 2014: <br> /ASK IF (Q23 <br> CIGARNOW EQ $(1,2,3)$ <br> AND Q24 CIGARTYPE <br> EQ (1,2,3,-8) AND Q25 <br> CIGARFILT EQ (1,2,3,4,- <br> 8)/ FEB-SEPT '14: /ASK IF <br> (Q23 CIGARNOW EQ <br> $(1,2,3)$ AND Q24 <br> CIGARTYPE EQ (1,2,3,4,- <br> 8) AND Q25 CIGARFILT <br> EQ (1,2,3,4,-8)/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 26 | CIGARBRAND_OTH | char | 50 | WHAT IS THE NAME BRAND OF THE CIGAR, CIGARILLO, OR LITTLE FILTERED CIGAR THAT YOU USUALLY SMOKESPECIFY | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q26 CIGARBRAND EQ 96/ |
| 27 | CIGARFLAV | num | 3 | IN THE PAST 30 DAYS, WERE ANY OF THE CIGARS, CIGARILLOS, OR LITTLE FILTERED CIGARS THAT YOU SMOKED FLAVORED TO TASTE LIKE MENTHOL OR MINT, CLOVE, SPICE, CANDY, FRUIT, CHOCOLATE OR OTHER SWEETS? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \\ & 3=\text { RESPONDENT DID NOR } \\ & \text { SMOKE ANY CIGARS IN THE } \\ & \text { PAST } 30 \text { DAYS } \end{aligned}$ | Questionnaire | /ASK IF (Q23 <br> CIGARNOW EQ $(1,2,3) /$ |
| 28 | CIGARFLAV2A | num | 3 | WAS THE CIGAR, CIGARILLO, OR LITTLE FILTERED CIGAR MENTHOL OR MINT FLAVORED? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q27 <br> CIGARFLAV EQ 1/ |
| 28 | CIGARFLAV2B | num | 3 | WAS THE CIGAR, CIGARILLO, OR LITTLE <br> FILTERED CIGAR CLOVE, SPICE OR HERB FLAVORED? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q27 <br> CIGARFLAV EQ 1/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 28 | CIGARFLAV2C | num | 3 | WAS THE CIGAR, CIGARILLO, OR LITTLE FILTERED CIGAR FRUIT FLAVORED? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q27 <br> CIGARFLAV EQ 1/ |
| 28 | CIGARFLAV2D | num | 3 | WAS THE CIGAR, <br> CIGARILLO, OR LITTLE <br> FILTERED CIGAR <br> ALCOHOL FLAVORED? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q27 <br> CIGARFLAV EQ 1/ |
| 28 | CIGARFLAV2E | num | 3 | WAS THE CIGAR, CIGARILLO, OR LITTLE FILTERED CIGAR CANDY, CHOCOLATE, OR OTHER SWEET FLAVORED? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q27 <br> CIGARFLAV EQ 1/ |
| 28 | CIGARFLAV2F | num | 3 | WAS THE CIGAR, CIGARILLO, OR LITTLE <br> FILTERED CIGAR <br> ANOTHER FLAVOR? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q27 <br> CIGARFLAV EQ 1/ |
| 28 | CIGARFLAV2_OTH | char | 40 | WAS THE CIGAR, CIGARILLO, OR LITTLE FILTERED CIGAR ANOTHER FLAVORSPECIFY | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q28 <br> CIGARFLAV2F EQ 1/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 29 | CIGARSUSCEPT | num | 3 | DO YOU THINK YOU WILL SMOKE A CIGAR, CIGARILLO OR LITTLE FILTERED CIGAR WITHIN THE NEXT YEAR? WOULD YOU SAY...? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { DEFINITELY YES } \\ & 2=\text { PROBABLY YES } \\ & 3=\text { PROBABLY NOT } \\ & 4=\text { DEFINITELY NOT } \end{aligned}$ | Questionnaire | /ASK IF Q2 AGE EQ (1829) AND Q22 <br> CIGARPAST EQ (2,-8) <br> AND Q23 CIGARNOW EQ (4,-8)/ |
| 30 | PIPEREGPAST | num | 3 | HAVE YOU SMOKED A REGULAR PIPE FILLED WITH TOBACCO AT LEAST 50 TIMES IN YOUR ENTIRE LIFE? | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 31 | PIPEREGNOW | num | 3 | DO YOU NOW SMOKE A REGULAR PIPE FILLED WITH TOBACCO EVERY DAY, SOME DAYS, RARELY, OR NOT AT ALL? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { EVERY DAY } \\ & 2=\text { SOME DAYS } \\ & 3=\text { RARELY } \\ & 4=\text { NOT AT ALL } \end{aligned}$ | Questionnaire | /ASK IF (Q2 AGE EQ (18- <br> 29) AND Q30 <br> PIPEREGPAST EQ (2,-8)) <br> OR Q30 PIPEREGPAST <br> EQ 1/ |
| 32 | PIPEREGSUSCEPT | num | 3 | DO YOU THINK YOU WILL SMOKE A REGULAR PIPE FILLED WITH TOBACCO WITHIN THE NEXT YEAR? WOULD YOU SAY...? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { DEFINITELY YES } \\ & 2=\text { PROBABLY YES } \\ & 3=\text { PROBABLY NOT } \\ & 4=\text { DEFINITELY NOT } \end{aligned}$ | Questionnaire | /ASK IF Q2 AGE EQ (1829) AND Q30 <br> PIPEREGPAST EQ $(2,-8)$ <br> AND Q31 PIPEREGNOW $\text { EQ }(4,-8) /$ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 33 | PIPEWTREVER | num | 3 | HAVE YOU EVER SMOKED TOBACCO IN A HOOKAH IN YOUR ENTIRE LIFE? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 34 | PIPEWTRTIMES | num | 3 | HOW MANY TIMES IN TOTAL DO YOU THINK YOU HAVE SMOKED TOBACCO IN A HOOKAH DURING YOUR LIFETIME? WOULD YOU SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=1-5 \text { TIMES } \\ & 2=6-20 \text { TIMES } \\ & 3=21-50 \text { TIMES } \\ & 4=\text { OVER } 50 \text { TIMES } \end{aligned}$ | Questionnaire | /ASK IF Q33 <br> PIPEWTREVER EQ 1/ |
| 35 | PIPEWTRNOW | num | 3 | DO YOU NOW SMOKE <br> TOBACCO IN A HOOKAH <br> EVERY DAY, SOME DAYS, <br> RARELY OR NOT AT ALL? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1 \text { = EVERY DAY } \\ & 2=\text { SOME DAYS } \\ & 3=\text { RARELY } \\ & 4=\text { NOT AT ALL } \end{aligned}$ | Questionnaire | /ASK IF Q33 <br> PIPEWTREVER EQ 1/ |
| 36 | PIPEWTRSUSCEPT | num | 3 | DO YOU THINK YOU WILL SMOKE TOBACCO IN A HOOKAH WITHIN THE NEXT YEAR? WOULD YOU SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { DEFINITELY YES } \\ & 2=\text { PROBABLY YES } \\ & 3=\text { PROBABLY NOT } \\ & 4=\text { DEFINITELY NOT } \end{aligned}$ | Questionnaire | /ASK IF Q2 AGE EQ (1829) AND (Q33 <br> PIPEWTREVER EQ $(2,-8)$ OR Q35 PIPEWTRNOW EQ (4,-8))/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 37 | PIPEFLAV | num | 3 | WAS ANY OF THE TOBACCO SMOKED IN A REGULAR PIPE OR HOOKAH FLAVORED? (SEE QUESTIONNAIRE) | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \\ & 3=\text { RESPONDENT DID NOT } \\ & \text { SMOKE ANY TOBACCO IN A } \\ & \text { PIPE IN THE PAST } 30 \text { DAYS } \end{aligned}$ | Questionnaire | /ASK IF Q31 <br> PIPEREGNOW EQ $(1,2,3)$ OR Q35 PIPEWTRNOW $\text { EQ }(1,2,3) /$ |
| 38 | PIPEFLAV2A | num | 3 | WAS THE TOBACCO IN THE REGULAR PIPE OR <br> HOOKAH MENTHOL OR <br> MINT FLAVORED? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1: \text { YES } \\ & 2: \text { NO } \end{aligned}$ | Questionnaire | $\begin{aligned} & \text { IASK IF Q37 PIPEFLAV } \\ & \text { EQ 1/ } \end{aligned}$ |
| 38 | PIPEFLAV2B | num | 3 | WAS THE TOBACCO IN THE REGULAR PIPE OR HOOKAH CLOVE, SPICE OR HERB FLAVORED? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q37 PIPEFLAV EQ 1/ |
| 38 | PIPEFLAV2C | num | 3 | WAS THE TOBACCO IN THE REGULAR PIPE OR HOOKAH FRUIT FLAVORED? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | $\begin{aligned} & \text { /ASK IF Q37 PIPEFLAV } \\ & \text { EQ 1/ } \end{aligned}$ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 38 | PIPEFLAV2D | num | 3 | WAS THE TOBACCO IN THE REGULAR PIPE OR <br> HOOKAH ALCOHOL <br> FLAVORED? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q37 PIPEFLAV EQ 1/ |
| 38 | PIPEFLAV2E | num | 3 | WAS THE TOBACCO IN THE REGULAR PIPE OR HOOKAH CANDY, CHOCOLATE OR OTHER SWEET FLAVORED? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q37 PIPEFLAV EQ 1/ |
| 38 | PIPEFLAV2F | char | 3 | WAS THE TOBACCO IN THE REGULAR PIPE OR HOOKAH ANOTHER FLAVOR? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q37 PIPEFLAV EQ 1/ |
| 38 | PIPEFLAV2_OTH | char | 40 | WAS THE TOBACCO IN THE REGULAR PIPE OR <br> HOOKAH ANOTHER <br> FLAVOR-SPECIFY | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q38 PIPEFLAV2F EQ 1/ |
| 39 | ECIGHEARD | num | 3 | BEFORE TODAY, HAD YOU <br> EVER HEARD OF <br> ELECTRONIC CIGARETTES <br> OR E-CIGARETTES? | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 40 | ECIGEVER | num | 3 | HAVE YOU EVER USED AN ELECTRONIC CIGARETTE, EVEN JUST ONE TIME IN YOUR ENTIRE LIFE? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q39 ECIGHEARD EQ 1/ |
| 41 | ECIGTIMES | num | 3 | HOW MANY TIMES IN TOTAL DO YOU THINK YOU HAVE USED AN ELECTRONIC-CIGARETTE DURING YOUR LIFETIME? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=1-10 \text { TIMES } \\ & 2=11-20 \text { TIMES } \\ & 3=21-50 \text { TIMES } \\ & 4=\text { OVER } 50 \text { TIMES } \end{aligned}$ | Questionnaire | /ASK IF Q40 ECIGEVER EQ 1/ |
| 42 | ECIGNOW | num | 3 | DO YOU NOW USE <br> ELECTRONIC <br> CIGARETTES....? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { EVERY DAY } \\ & 2=\text { SOME DAYS } \\ & 3=\text { RARELY } \\ & 4=\text { NOT AT ALL } \end{aligned}$ | Questionnaire | /ASK IF Q40 ECIGEVER EQ 1/ |
| 43 | ECIGFLAV | num | 3 | WERE ANY OF THE ELECTRONIC CIGARETTES THAT YOU USED IN THE PAST 30 DAYS FLAVORED TO TASTE LIKE MENTHOL, MINT, CLOVE, SPICE, CANDY, FRUIT, CHOCOLATE, OR OTHER SWEETS? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \\ & 3=\text { RESP DID NOT USE ANY } \\ & \text { NON-CIG TOBACCO } \\ & \text { PRODUCT PAST } 30 \text { DAYS } \end{aligned}$ | Questionnaire | /ASK IF Q42 ECIGNOW EQ (1,2,3)/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 44 | ECIGFLAV2A | num | 3 | WERE THE ELECTRONIC CIGARETTES MENTHOL OR MINT FLAVORED? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1: \text { YES } \\ & \text { 2: NO } \end{aligned}$ | Questionnaire | /ASK IF Q43 ECIGFLAV EQ 1/ |
| 44 | ECIGFLAV2B | num | 3 | WERE THE ELECTRONIC CIGARETTES CLOVE, SPICE OR HERB FLAVORED? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1: \text { YES } \\ & 2: \text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q43 ECIGFLAV EQ 1/ |
| 44 | ECIGFLAV2C | num | 3 | WERE THE ELECTRONIC CIGARETTES CANDY, CHOCOLATE, OR OTHER SWEET FLAVORED | $\begin{array}{\|l} \hline-1=\text { INAPPLICABLE } \\ -7=\text { REFUSED } \\ -8=\text { DK } \\ -9=\text { NOT ASCERTAINED } \\ 1: \text { YES } \\ 2: \text { NO } \end{array}$ | Questionnaire | /ASK IF Q43 ECIGFLAV EQ 1/ |
| 44 | ECIGFLAV2D | num | 3 | WERE THE ELECTRONIC CIGARETTES FRUIT FLAVORED? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1: \text { YES } \\ & 2: \text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q43 ECIGFLAV EQ 1/ |
| 44 | ECIGFLAV2E | num | 3 | WERE THE ELECTRONIC CIGARETTTES ALCOHOL FLAVORED? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1: \text { YES } \\ & 2: \text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q43 ECIGFLAV EQ 1/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 44 | ECIGFLAV2F | num | 3 | WERE THE ELECTRONIC CIGARETTTES ANOTHER FLAVOR? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1: \text { YES } \\ & 2: \text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q43 ECIGFLAV EQ 1/ |
| 44 | ECIGFLAV2_OTH | char | 40 | WERE THE ELECTRONIC CIGARETTTES ANOTHER FLAVOR-SPECIFY | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q44 <br> ECIGFLAV2F EQ 1/ |
| 45 | ECIGSUSCEPT | num | 3 | DO YOU THINK YOU WILL USE AN ELECTRONIC CIGARETTE OR E- <br> CIGARETTE IN THE NEXT <br> YEAR? WOULD YOU SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { DEFINITELY YES } \\ & 2=\text { PROBABLY YES } \\ & 3=\text { PROBABLY NOT } \\ & 4=\text { DEFINITELY NOT } \end{aligned}$ | Questionnaire | /ASK IF Q40 ECIGEVER EQ $(2,-8)$ OR Q42 ECIGNOW EQ (4,-8) |
| 46 | SMKOTHAGE | num | 4 | HOW OLD WERE YOU WHEN YOU FIRST SMOKED A CIGAR, CIGARILLO, OR LITTLE FILTERED CIGAR; A REGULAR PIPE OR HOOKAH; OR AN ELECTRONIC CIGARETTEEVEN IF ONLY ONE OR TWO PUFFS? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q22 CIGARPAST EQ 1 OR <br> Q33 PIPEWTREVER EQ 1 OR Q30 PIPEREGPAST EQ 1 OR Q40 ECIGEVER EQ 1/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 47 | CSDPAST | num | 3 | HAVE YOU USED CHEWING TOBACCO, SNUFF OR DIP AT LEAST 20 TIMES IN YOUR ENTIRE LIFE? | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 48 | CSDNOW | num | 3 | DO YOU NOW USE <br> CHEWING TOBACCO, <br> SNUFF, OR DIP...? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { EVERY DAY } \\ & 2=\text { SOME DAYS } \\ & 3=\text { RARELY } \\ & 4=\text { NOT AT ALL } \end{aligned}$ | Questionnaire | /ASK IF (Q2 AGE EQ (18- <br> 29) AND Q47 CSDPAST EQ (2,-8)) OR Q47 CSDPAST EQ $1 /$ |
| 49 | CSDSUSCEPT | num | 3 | DO YOU THINK YOU WILL CHEW TOBACCO, OR USE SNUFF OR DIP WITHIN THE NEXT YEAR? WOULD YOU SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { DEFINITELY YES } \\ & 2=\text { PROBABLY YES } \\ & 3=\text { PROBABLY NOT } \\ & 4=\text { DEFINITELY NOT } \end{aligned}$ | Questionnaire | /ASK IF Q2 AGE EQ (18- <br> 29) AND Q47 CSDPAST <br> EQ (2,-8) AND Q48 <br> CSDNOW EQ (4,-8)/ |
| 50 | SNUSHEARD | num | 3 | HAVE YOU EVER HEARD OF SNUS, SUCH AS CAMEL SNUS OR MARLBORO SNUS? | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 51 | SNUSEVER | num | 3 | HAVE YOU EVER TRIED SNUS, EVEN JUST ONE TIME IN YOUR ENTIRE LIFE? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q50 SNUSHEARD EQ 1/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 52 | SNUSTIMES | num | 3 | HOW MANY TIMES IN TOTAL DO YOU THINK YOU HAVE USED SNUS DURING YOUR LIFETIME? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=1-10 \text { TIMES } \\ & 2=11-20 \text { TIMES } \\ & 3=21-50 \text { TIMES } \\ & 4=\text { OVER } 50 \text { TIMES } \end{aligned}$ | Questionnaire | /ASK IF Q51 SNUSEVER EQ 1/ |
| 53 | SNUSNOW | num | 3 | DO YOU NOW USE SNUS...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { EVERY DAY } \\ & 2=\text { SOME DAYS } \\ & 3=\text { RARELY } \\ & 4=\text { NOT AT ALL } \end{aligned}$ | Questionnaire | /ASK IF Q51 SNUSEVER EQ 1/ |
| 54 | SNUSSUSCEPT | num | 3 | DO YOU THINK YOU WILL USE SNUS WITHIN THE NEXT YEAR? WOULD YOU SAY...? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { DEFINITELY YES } \\ & 2=\text { PROBABLY YES } \\ & 3=\text { PROBABLY NOT } \\ & 4=\text { DEFINITELY NOT } \end{aligned}$ | Questionnaire | /ASK IF Q51 SNUSEVER EQ (2,-8) OR Q53 SNUSNOW EQ (4,-8)/ |
| 55 | DISSHEARD | num | 3 | HAVE YOU EVER HEARD OF A DISSOLVABLE TOBACCO PRODUCT? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 56 | DISSEVER | num | 3 | HAVE YOU EVER TRIED A DISSOLVABLE TOBACCO PRODUCT, EVEN JUST ONE TIME IN YOUR ENTIRE LIFE? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q55 DISSHEARD EQ 1/ |
| 57 | DISSTIMES | num | 3 | HOW MANY TIMES IN TOTAL DO YOU THINK YOU HAVE USED A DISSOLVABLE TOBACCO PRODUCT DURING YOUR LIFETIME? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=1-10 \text { TIMES } \\ & 2=11-20 \text { TIMES } \\ & 3=21-50 \text { TIMES } \\ & 4=\text { OVER } 50 \text { TIMES } \\ & \hline \end{aligned}$ | Questionnaire | /ASK IF Q56 DISSEVER EQ 1/ |
| 58 | DISSNOW | num | 3 | DO YOU NOW USE DISSOLVABLE TOBACCO PRODUCTS....? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { EVERY DAY } \\ & 2=\text { SOME DAYS } \\ & 3=\text { RARELY } \\ & 4=\text { NOT AT ALL } \end{aligned}$ | Questionnaire | /ASK IF Q56 DISSEVER EQ 1/ |
| 59 | DISSSUSCEPT | num | 3 | DO YOU THINK YOU WILL USE A DISSOLVABLE TOBACCO PRODUCT WITHIN THE NEXT YEAR? WOULD YOU SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { DEFINITELY YES } \\ & 2=\text { PROBABLY YES } \\ & 3=\text { PROBABLY NOT } \\ & 4=\text { DEFINITELY NOT } \end{aligned}$ | Questionnaire | /ASK IF Q56 DISSEVER EQ (2,-8) OR Q58 DISSNOW EQ (4,-8)/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 60 | SMKLSFLAV | num | 3 | IN THE PAST 30 DAYS, WAS ANY OF THE SMOKELESS TOBACCO PRODUCTS THAT YOU USED FLAVORED TO TASTE LIKE MENTHOL, MINT, CLOVE, SPICE, CANDY, FRUIT, CHOCOLATE, OR OTHER SWEETS? | $\begin{array}{\|l\|} \hline-1=\text { INAPPLICABLE } \\ -7=\text { REFUSED } \\ -8=\text { DK } \\ -9=\text { NOT ASCERTAINED } \\ 1=\text { YES } \\ 2=\text { NO } \\ 3=\text { RESPONDENT DID NOT } \\ \text { USE ANY SMOKELESS } \\ \text { TOBACCO PRODUCTS IN THE } \\ \text { PAST } 30 \end{array}$ | Questionnaire | /ASK IF Q48 CSDNOW EQ $(1,2,3)$ OR Q53 SNUSNOW EQ $(1,2,3)$ OR Q58 DISSNOW EQ (1,2,3)/ |
| 61 | SMKLSFLAV2A | num | 3 | WAS THE SMOKELESS TOBACCO PRODUCT MENTHOL OR MINT FLAVORED? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q60 <br> SMKLSFLAV EQ 1/ |
| 61 | SMKLSFLAV2B | num | 3 | WAS THE SMOKELESS TOBACCO PRODUCT CLOVE, SPICE OR HERB FLAVORED? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q60 <br> SMKLSFLAV EQ 1/ |
| 61 | SMKLSFLAV2C | num | 3 | WAS THE SMOKELESS TOBACCO PRODUCT FRUIT FLAVORED? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q60 <br> SMKLSFLAV EQ 1/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 61 | SMKLSFLAV2D | num | 3 | WAS THE SMOKELESS TOBACCO PRODUCT ALCOHOL FLAVORED? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q60 <br> SMKLSFLAV EQ 1/ |
| 61 | SMKLSFLAV2E | num | 3 | WAS THE SMOKELESS TOBACCO PRODUCT CANDY, CHOCOLATEOR OTHER SWEET FLAVORED? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q60 SMKLSFLAV EQ 1/ |
| 61 | SMKLSFLAV2F | num | 3 | WAS THE SMOKELESS TOBACCO PRODUCT ANOTHER FLAVOR? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q60 <br> SMKLSFLAV EQ 1/ |
| 61_OTH | SMKLSFLAV2_OTH | char | 40 | WAS THE SMOKELESS TOBACCO PRODUCT ANOTHER FLAVORSPECIFY | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q61 <br> SMKLSFLAV2F EQ 1/ |
| 62 | SMKLSAGE | num | 4 | HOW OLD WERE YOU WHEN YOU FIRST TRIED SMOKELESS TOBACCO PRODUCT? | $\begin{array}{\|l} \hline-1=\text { INAPPLICABLE } \\ -7=\text { REFUSED } \\ -8=\text { DK } \\ -9=\text { NOT ASCERTAINED } \end{array}$ | Questionnaire | /ASK IF Q47 CSDPAST EQ 1 OR Q51 SNUSEVER EQ 1 OR Q56 DISSEVER EQ 1/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 63 | TOBACYRAGO | num | 3 | AROUND THIS TIME 12 MONTHS AGO, WERE YOU USING ANY KIND OF TOBACCO PRODUCT? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /[ASK IF (Q13 <br> SMOKEVER EQ 2 OR <br> Q18 SMOKYRAGO EQ 3) <br> AND (Q22 CIGARPAST <br> EQ 1 OR <br> Q33 PIPEWTREVER EQ 1 <br> OR Q30 PIPEREGPAST <br> EQ 1 OR Q40 ECIGEVER <br> EQ 1 OR Q47 CSDPAST <br> EQ 1 OR Q51 SNUSEVER <br> EQ 1 OR Q56 DISSEVER <br> EQ 1)] OR [Q2 AGE EQ <br> (18-29) AND (Q23 <br> CIGARNOW EQ $(1,2,3)$ <br> OR Q31 PIPEREGNOW <br> EQ $(1,2,3)$ OR Q48 <br> CSDNOW EQ $(1,2,3))] /$ |
| 64 | QUITCOM (a similar question was named OTHQUITALL in 2012) | num | 3 | HAVE YOU COMPLETELY QUIT USING [INSERT COMBUSTIBLE TOBACCO PRODUCTS] | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /IF [(Q3 SMOK100 EQ 1 <br> AND Q4 SMOKNOW EQ <br> 3) OR Q13 SMOKEVER <br> EQ 1] AND [(Q22 <br> CIGARPAST EQ 1 AND Q23 CIGARNOW EQ 4) <br> OR (Q30 PIPEREGPAST <br> EQ 1 AND Q31 <br> PIPEREGNOW EQ 4) OR (Q33 PIPEWTREVER EQ 1 AND Q35 <br> PIPEWTRNOW EQ 4) OR (Q47 CSDPAST EQ 1 <br> AND Q48 CSDNOW EQ 4) OR (Q51 SNUSEVER EQ 1 AND Q53 SNUSNOW EQ 4) OR (Q56 DISSEVER EQ 1 AND Q58 DISSNOW EQ 4) OR (Q40 ECIGEVER EQ 1 AND Q42 ECIGNOW EQ 4)]/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 65 | QUITCOM1 (a similar question was named OTHQUIT1 in 2012) | num | 8 | ABOUT HOW LONG HAS IT BEEN SINCE YOU QUIT USING [COMBUSTIBLE TOBACCO PRODUCTS] | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1 \text { = DAYS } \\ & 2=\text { WEEKS } \\ & 3=\text { MONTHS } \\ & 4=\text { YEARS } \\ & 5=\text { AGE } \\ & 666 ~=~ D A T E ~ \\ & 888 ~=~ T O D A Y ~ \end{aligned}$ | Questionnaire | /ASK IF Q64 QUITCOM $=1 /$ |
| 65 | QUITCMD2 (a similar <br> question was named OTHQUTD2 in 2012) | num | 4 | NUMBER OF DAYS NOT USING COMBUSTIBLE TOBACCO PRODUCTS | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | FILL IF QUITCOM1=1 |
| 65 | QUITCMM2 (a similar question was named OTHQUTM2 in 2012) | num | 3 | NUMBER OF MONTHS NOT USING COMBUSTIBLE TOBACCO PRODUCTS | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | FILL IF QUITCOM1=3 |
| 65 | QUITCMW2 (a similar question was named OTHQUTW2 in 2012) | num | 4 | NUMBER OF WEEKS NOT USING COMBUSTIBLE TOBACCO PRODUCTS | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | FILL IF QUITCOM1=2 |
| 65 | QUITCMY2 (a similar question was named OTHQUTY2 in 2012) | num | 3 | NUMBER OF YEARS NOT USING COMBUSTIBLE TOBACCO PRODUCTS | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | FILL IF QUITCOM1=4 |
| 65 | QUITCMDD (a similar question was named OTHQUTDD in 2012) | num | 3 | DAY OF QUITTING USING COMBUSTIBLE TOBACCO PRODUCTS | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \\ & -8=\text { DK } \end{aligned}$ | Questionnaire | FILL IF QUITCOM1=666 |
| 65 | QUITCMYY (a similar question was named OTHQUTYY in 2012) | num | 4 | YEAR OF QUITTING USING COMBUSTIBLE TOBACCO PRODUCTS | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | FILL IF QUITCOM1=666 |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 65 | QUITCMMM (a similar question was named OTHQUTMM in 2012) | num | 3 | MONTH OF QUITTING USING COMBUSTIBLE TOBACCO PRODUCTS | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | FILL IF QUITCOM1 $=666$ |
| 65 | QUITCMA2 | num | 3 | AGE WHEN STOPPED USING COMBUSTIBLE TOBACCO PRODUCTS | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | FILL IF QUITCOM1 $=5$ |
| 68 | SOMEDAYUSE | num | 3 | THINKING ABOUT THESE TOBACCO PRODUCTS, ARE THERE SOME DAYS WHEN YOU DO NOT USE ANY OF THESE PRODUCTS? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF <br> EVERYDAYPRODUCTC OUNT EQ 0 AND SOMEDAYPRODUCTCO UNT EQ (2-8) |
| 69M | SMOKWAKE1 | num | 4 | MINUTES AFTER WAKING UP TO 1ST USE <br> CIGARETTE/CIGAR | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF SMOKWNUM=1 |
| 69H | SMOKWAKE2 | num | 3 | HOURS AFTER WAKING UP TO HAVE <br> 1ST CIGARETTE/CIGAR | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF SMOKWNUM=2/ |
| 69 | SMOKWNUM | num | 3 | ON AVERAGE, HOW SOON AFTER YOU WAKE UP DO YOU USUALLY FIRST USE ONE OF THE TOBACCO PRODUCTS? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { MINUTES } \\ & 2=\text { HOURS } \end{aligned}$ | Questionnaire | /ASK IF <br> EVERYDAYPRODUCTC OUNT EQ (1-8) OR Q68 SOMEDAYUSE EQ $2 /$ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 70 | AWAKEN | num | 3 | DO YOU SOMETIMES WAKE UP AT NIGHT IN ORDER TO HAVE A CIGARETTE OR OTHER TOBACCO PRODUCT? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ $(1,2)$ OR Q23 CIGARNOW EQ $(1,2,3)$ OR Q35 PIPEWTRNOW EQ $(1,2,3)$ OR <br> Q31 PIPEREGNOW EQ <br> $(1,2,3)$ OR Q42 ECIGNOW <br> EQ $(1,2,3)$ OR Q48 <br> CSDNOW EQ $(1,2,3)$ OR <br> Q53 SNUSNOW EQ <br> $(1,2,3)$ OR Q58 DISSNOW <br> EQ (1,2,3)/ |
| 71 | TOBACCRAVE | num | 3 | DURING THE PAST 30 DAYS, HAVE YOU HAD A STRONG CRAVING TO USE TOBACCO PRODUCTS OF ANY KIND? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ $(1,2)$ OR Q23 CIGARNOW EQ $(1,2,3)$ OR Q35 PIPEWTRNOW EQ $(1,2,3)$ OR <br> Q31 PIPEREGNOW EQ $(1,2,3)$ OR Q42 ECIGNOW EQ $(1,2,3)$ OR Q48 CSDNOW EQ $(1,2,3)$ OR Q53 SNUSNOW EQ <br> $(1,2,3)$ OR Q58 DISSNOW EQ $(1,2,3) /$ |
| 72 | TOBACNEED | num | 3 | DURING THE PAST 30 <br> DAYS, DID YOU EVER FEEL <br> LIKE YOU REALLY <br> NEEDED TO USE A <br> TOBACCO PRODUCT? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ $(1,2)$ OR Q23 CIGARNOW EQ $(1,2,3)$ OR Q35 PIPEWTRNOW EQ $(1,2,3)$ OR Q31 PIPEREGNOW EQ $(1,2,3)$ OR Q42 ECIGNOW EQ $(1,2,3)$ OR Q48 CSDNOW EQ $(1,2,3)$ OR Q53 SNUSNOW EQ $(1,2,3)$ OR Q58 DISSNOW EQ (1,2,3)/ |


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| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 73 | TOBACWANT | num | 3 | DURING THE PAST 30 DAYS, WAS THERE A TIME WHEN YOU WANTED TO USE A TOBACCO PRODUCT SO MUCH THAT YOU FOUND IT DIFFICULT TO THINK OF ANYTHING ELSE? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ $(1,2)$ OR Q23 CIGARNOW EQ $(1,2,3)$ OR Q35 PIPEWTRNOW EQ $(1,2,3)$ OR Q31 PIPEREGNOW EQ $(1,2,3)$ OR Q42 ECIGNOW EQ $(1,2,3)$ OR Q48 CSDNOW EQ $(1,2,3)$ OR Q53 SNUSNOW EQ $(1,2,3)$ OR Q58 DISSNOW EQ (1,2,3)/ |
| 74 | TOBACIRRIT | num | 3 | HOW TRUE IS THIS <br> STATEMENT FOR YOU? <br> AFTER NOT USING <br> TOBACCO FOR A WHILE, I <br> FEEL RESTLESS AND <br> IRRITABLE. WOULD YOU SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { NOT AT ALL TRUE } \\ & 2=\text { SOMETIMES TRUE } \\ & 3=\text { OFTEN TRUE } \\ & 4=\text { ALWAYS TRUE } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ $(1,2)$ OR Q23 CIGARNOW EQ $(1,2,3)$ OR Q35 PIPEWTRNOW EQ $(1,2,3)$ OR Q31 PIPEREGNOW EQ $(1,2,3)$ OR Q42 ECIGNOW EQ $(1,2,3)$ OR Q48 CSDNOW EQ $(1,2,3)$ OR Q53 SNUSNOW EQ $(1,2,3)$ OR Q58 DISSNOW EQ (1,2,3)/ |
| 75 | QUITATTEMPT | num | 3 | DURING THE PAST 12 <br> MONTHS, HAVE YOU STOPPED SMOKING FOR 24 HOURS OR MORE BECAUSE YOU WERE TRYING TO QUIT? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW $\text { EQ }(1,2) /$ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 76 | ECIGSWITCH | num | 3 | AT ANY TIME DURING THE PAST 12 MONTHS, DID YOU COMPLETELY SWITCH FROM SMOKING TRADITIONAL CIGARETTES TO USING ELECTRONIC OR ECIGARETTES? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q12D <br> SMOKLAST EQ LESS <br> THAN OR EQUAL TO 12 <br> MONTHS AND Q40 <br> ECIGEVER EQ 1/ |
| 77 | SMKLSSWITCH | num | 3 | AT ANY POINT DURING THE PAST 12 MONTHS, DID YOU COMPLETELY SWITCH FROM SMOKING CIGARETTES TO USING A SMOKELESS TOBACCO PRODUCT, SUCH AS CHEWING TOBACCO, DIP, SNUFF, OR SNUS? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF (Q12D SMOKLAST LESS THAN OR EQUAL TO 12 MONTHS/ |
| 78 | QUITCIGS | num | 3 | ARE YOU THINKING <br> ABOUT QUITTING <br> CIGARETTES FOR GOOD? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW $\text { EQ }(1,2) /$ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 79 | QUITCIGSOON | num | 3 | HOW SOON ARE YOU <br> LIKELY TO QUIT <br> SMOKING? WOULD YOU <br> SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { WITHIN THE NEXT } 30 \\ & \text { DAYS } \\ & 2=\text { WITHIN THE NEXT } 6 \\ & \text { MONTHS } \\ & 3=\text { WITHIN THE YEAR } \\ & 4=\text { LONGER THAN A YEAR } \end{aligned}$ | Questionnaire | /ASK IF Q78 QUITCIGS EQ 1/ |
| 80 | QUITALLTOBAC | num | 3 | ARE YOU THINKING <br> ABOUT QUITTING THE USE <br> OF ALL TOBACCO <br> PRODUCTS FOR GOOD? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF [Q78 QUITCIGS EQ 1 AND (Q23 <br> CIGARNOW EQ $(1,2,3)$ OR Q35 PIPEWTRNOW EQ $(1,2,3)$ OR <br> Q31 PIPEREGNOW EQ <br> $(1,2,3)$ OR Q42 ECIGNOW <br> EQ $(1,2,3)$ OR Q48 <br> CSDNOW EQ $(1,2,3)$ OR <br> Q53 SNUSNOW EQ <br> $(1,2,3)$ OR Q58 DISSNOW <br> EQ (1,2,3))] OR [Q4 <br> SMOKNOW EQ (3,-8,-7) <br> AND (Q23 CIGARNOW <br> EQ $(1,2,3)$ OR <br> Q35 PIPEWTRNOW EQ <br> $(1,2,3)$ OR <br> Q31 PIPEREGNOW EQ <br> $(1,2,3)$ OR Q42 ECIGNOW <br> EQ $(1,2,3)$ OR <br> Q48 CSDNOW EQ $(1,2,3)$ <br> OR Q53 SNUSNOW EQ <br> $(1,2,3)$ OR Q58 DISSNOW <br> EQ (1,2,3))]/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 81 | QUITALLTOBACSOON | num | 3 | HOW SOON ARE YOU <br> LIKELY TO QUIT USING <br> ALL TOBACCO PRODUCTS? <br> WOULD YOU SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { WITHIN THE NEXT } 30 \\ & \text { DAYS } \\ & 2=\text { WITHIN THE NEXT } 6 \\ & \text { MONTHS } \\ & 3=\text { WITHIN THE YEAR } \\ & 4=\text { LONGER THAN A YEAR } \end{aligned}$ | Questionnaire | /ASK IF Q80 QUITALLTOBAC EQ 1/ |
| 82 | QUITPASTYR | num | 3 | DURING THE PAST 12 MONTHS, DID YOU STOP USING ALL KINDS OF TOBACCO PRODUCTS FOR MORE THAN ONE DAY BECAUSE YOU WERE TRYING TO QUIT USING TOBACCO? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ $(1,2)$ OR Q23 CIGARNOW EQ $(1,2,3)$ OR Q35 PIPEWTRNOW EQ $(1,2,3)$ OR <br> Q31 PIPEREGNOW EQ <br> $(1,2,3)$ OR Q42 ECIGNOW <br> EQ $(1,2,3)$ OR <br> Q48 CSDNOW EQ $(1,2,3)$ <br> OR Q53 SNUSNOW EQ <br> $(1,2,3)$ OR Q58 DISSNOW <br> EQ $(1,2,3) /$ |
| 83 | MARITAL2 | num | 3 | WHAT IS YOUR MARITAL STATUS? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { MARRIED } \\ & 2 \text { = LIVING WITH A PARTNER } \\ & 3 \text { = DIVORCED } \\ & 4 \text { = WIDOWED } \\ & 5=\text { SEPARATED } \\ & 6 \text { =SINGLE/NEVER } \\ & \text { MARRY/NOT LIVING W } \\ & \text { PARTNER } \\ & 91=\text { OTHER } \end{aligned}$ | Questionnaire | /ASK ALL/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 83_OTH | MARITAOT | char | 30 | WHAT IS YOUR MARITAL STATUS-SPECIFY | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q83 MARITAL2 EQ 91/ |
| 84 | HISPANIC | num | 3 | ARE YOU HISPANIC OR LATINO, OR OF SPANISH ORIGIN? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 85A | HISPMULTI1 | num | 3 | ARE YOU MEXICAN, MEXICAN AMERICAN, OR CHICANO? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q84 HISPANIC EQ 1/ |
| 85B | HISPMULTI2 | num | 3 | ARE YOU PUERTO RICAN? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q84 HISPANIC EQ 1/ |
| 85C | HISPMULTI3 | num | 3 | ARE YOU CUBAN? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q84 HISPANIC EQ 1/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 85D | HISPMULTI4 | num | 3 | ARE YOU ANOTHER HISPANIC, LATINO, OR SPANISH ORIGIN? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q84 HISPANIC EQ 1/ |
| 85_OTH | HISPMULTI_OTH | char | 40 | ENTER OTHER SPECIFIED HISPANIC CATEGORY | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q85D HISPMULTI14 EQ 1/ |
| 86 | RACEMULTI1 | num | 3 | ARE YOU WHITE? | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 86 | RACEMULTI2 | num | 3 | ARE YOU BLACK OR AFRICAN AMERICAN? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 86 | RACEMULTI3 | num | 3 | ARE YOU ASIAN? | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 86 | RACEMULTI4 | num | 3 | ARE YOU NATIVE HAWAIIAN OR OTHER PACIFIC ISLANDER? | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 86 | RACEMULTI5 | num | 3 | ARE YOU AMERICAN INDIAN OR ALASKA NATIVE? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 86 | RACEMULTI6 | num | 3 | ARE YOU SOME OTHER RACIAL CATEGORY? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 86_OTH | RACEMULTI_OTH | char | 40 | ENTER OTHER SPECIFIED RACIAL CATEGORY | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q86 <br> RACEMULTI6 EQ 1/ |
| 87 | ASIANMULTI1 | num | 3 | ARE YOU ASIAN INDIAN? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q86 RACEMULTI3 EQ 1/ |
| 87 | ASIANMULTI2 | num | 3 | ARE YOU CHINESE? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q86 RACEMULTI3 EQ 1/ |
| 87 | ASIANMULTI3 | num | 3 | ARE YOU FILIPINO? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q86 RACEMULTI3 EQ 1/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 87 | ASIANMULTI4 | num | 3 | ARE YOU JAPANESE? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q86 RACEMULTI3 EQ 1/ |
| 87 | ASIANMULTI5 | num | 3 | ARE YOU KOREAN? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q86 RACEMULTI3 EQ 1/ |
| 87 | ASIANMULTI6 | num | 3 | ARE YOU VIETNAMESE? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q86 RACEMULTI3 EQ 1/ |
| 87 | ASIANMULTI7 | num | 3 | ARE YOU SOME OTHER ASIAN CATEGORY? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q86 RACEMULTI3 EQ 1/ |
| 87_OTH | ASIANMULTI_OTH | char | 40 | ENTER OTHER SPECIFIED ASIAN | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q87 <br> ASIANMULTI7 EQ 1/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 88 | NHOPIMULTI1 | num | 3 | ARE YOU NATIVE HAWAIIAN? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q86 RACEMULTI4 EQ 1/ |
| 88 | NHOPIMULTI2 | num | 3 | ARE YOU GUAMANIAN OR CHAMORRO? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q86 RACEMULTI4 EQ 1/ |
| 88 | NHOPIMULTI3 | num | 3 | ARE YOU SAMOAN? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q86 RACEMULTI4 EQ 1/ |
| 88 | NHOPIMULTI4 | num | 3 | ARE YOU SOME OTHER PACIFIC ISLANDER CATEGORY? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q86 RACEMULTI4 EQ 1/ |
| 88_OTH | NHOPIMULTI_OTH | char | 40 | ENTER OTHER SPECIFIED PACIFIC ISLANDER | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q88 NHOPIMULTI4 EQ 1/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 89 | EDUCA2 | num | 3 | WHAT IS THE HIGHEST LEVEL OF SCHOOL YOU HAVE COMPLETED OR THE HIGHEST DEGREE YOU HAVE RECEIVED? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=5 \text { TH GRADE OR LESS } \\ & 2=6 \mathrm{TH} \text { GRADE } \\ & 3=7 \mathrm{TH} \text { GRADE } \\ & 4=8 \mathrm{TH} \text { GRADE } \\ & 5=9 \mathrm{TH} \text { GRADE } \\ & 6=10 \mathrm{TH} \text { GRADE } \\ & 7=11 \mathrm{TH} \text { GRADE } \\ & 8=12 \text { GRADE, NO DIPLOMA } \\ & 9=\text { GED OR EQUIVALENT } \\ & 10=\text { HIGH SCHOOL DIPLOMA } \\ & 11=\text { SOME COLLEGE, NO } \\ & \text { DEGREE } \\ & 12=\text { CERTIFICATE, DIPLOMA, } \\ & \text { OR ASSOCIATE DEGREE } \\ & 13=\text { ASSOCIATE DEGREE: } \\ & \text { ACADEMIC PROGRAM } \\ & 14=\text { BACHELORS DEGREE } \\ & 15=\text { MASTERS DEGREE } \\ & 16=\text { PROFESSIONAL SCHOOL } \\ & \text { DEGREE(MD,DDS,DVM,LLB, } \\ & \text { JD) } \\ & 17=\text { DOCTORAL } \\ & \text { DEGREE(PHD,EDD) } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 90 | GENDERB | num | 3 | WHAT SEX WERE YOU AT BIRTH? | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { MALE } \\ & 2=\text { FEMALE } \end{aligned}$ | Questionnaire | /ASK ALL/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 91 | GENDER (wording slightly differently in 2012) | num | 3 | DO YOU CURRENTLY <br> CONSIDER YOURSELF TO BE... | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { MALE } \\ & 2=\text { FEMALE } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 92 | TELNOSGT1 | num | 3 | DO YOU HAVE MORE THAN ONE LANDLINE TELEPHONE NUMBER IN YOUR HOUSEHOLD? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF SAMPLE FILE TYPE EQ LANDLINE/ |
| 93 | TELNOSRES | num | 3 | HOW MANY OF THESE ARE RESIDENTIAL NUMBERS? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q92 TELNOSGT1 EQ 1/ |
| 94 | CELLPERS | num | 3 | DO YOU HAVE A CELL PHONE FOR PERSONAL USE? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF SAMPLE FILE TYPE EQ LANDLINE/ |
| 95 | CELLPCTSH | num | 4 | PERCENT OF INCOMING CALLS RECEIVED ON CELL PHONE | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q94 CELLPERS EQ 1/ |
| 96 | STATEFIPS | char | 2 | WHAT STATE DO YOU LIVE IN? (SELF- REPORTED) | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & \text { AK }=\text { ALASKA } . . \\ & \ldots \text { WY = WYOMING } \end{aligned}$ <br> (Please refer to the appendix for the list of state abbreviations) | Questionnaire | /ASK ALL/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 98 | EMPLOY2 | num | 3 | ARE YOU CURRENTLY WORKING FOR PAY OR ARE YOU SELF-EMPLOYED, EITHER PART-TIME OR FULL-TIME? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 99 | HOUSINGTYPE | num | 3 | IN WHAT TYPE OF LIVING <br> SPACE DO YOU <br> CURRENTLY RESIDE? | $\begin{aligned} & \hline-7 \text { = REFUSED } \\ & -8 \text { = DK } \\ & -9 \text { = NOT ASCERTAINED } \\ & \text { 1: A ONE-FAMILY HOUSE } \\ & \text { DETACHED FROM ANY } \\ & \text { OTHER HOUSE } \\ & \text { 2: A ONE-FAMILY HOUSE } \\ & \text { ATTACHED TO ONE OR } \\ & \text { MORE HOUSES } \\ & \text { 3: A BUILDING WITH } 2 \\ & \text { APARTMENTS OR LIVING } \\ & \text { UNITS } \\ & \text { 4: A BUILDING WITH } 3 \text { TO } 9 \\ & \text { APARTMENTS OR LIVING } \\ & \text { UNITS } \\ & \text { 5: A BUILDING WITH 10 TO 49 } \\ & \text { APARTMENTS OR LIVING } \\ & \text { UNITS } \\ & \text { 6: A BUILDING WITH 50 OR } \\ & \text { MORE APARTMENTS OR } \\ & \text { LIVING UNITS } \\ & \text { 7: A MOBILE HOME, BOAT, } \\ & \text { RV, OR VAN } \\ & \text { 8: SOME OTHER TYPE OF } \\ & \text { LIVING SPACE } \end{aligned}$ | Questionnaire | /ASK ALL/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 100 | PROMO1 | num | 3 | HAVE YOU NOTICED PROMOTIONS FOR FREE <br> SAMPLES OF CIGARETTES, IN THE <br> PAST 30 DAYS? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q2 AGE EQ (1829) OR Q4 SMOKNOW EQ $(1,2)$ OR Q23 <br> CIGARNOW EQ $(1,2,3)$ OR Q35 PIPEWTRNOW EQ $(1,2,3)$ OR <br> Q31 PIPEREGNOW EQ $(1,2,3)$ OR Q42 ECIGNOW EQ $(1,2,3)$ OR Q48 CSDNOW EQ $(1,2,3)$ OR Q53 SNUSNOW EQ $(1,2,3)$ OR Q58 DISSNOW EQ $(1,2,3) /$ |
| 100 | PROMO2 | num | 3 | HAVE YOU NOTICED PROMOTIONS FOR FREE SAMPLES OF SMOKELESS TOBACCO <br> PRODUCTS IN STORES AND VENUES WHERE CHILDREN ARE ALLOWED, IN THE PAST 30 DAYS? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q2 AGE EQ (1829) OR Q4 SMOKNOW EQ $(1,2)$ OR Q23 <br> CIGARNOW EQ $(1,2,3)$ OR Q35 PIPEWTRNOW EQ $(1,2,3)$ OR Q31 PIPEREGNOW EQ $(1,2,3)$ OR Q42 ECIGNOW EQ $(1,2,3)$ OR <br> Q48 CSDNOW EQ $(1,2,3)$ OR Q53 SNUSNOW EQ $(1,2,3)$ OR Q58 DISSNOW EQ (1,2,3)/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 100 | PROMO3 | num | 3 | (HAVE YOU NOTICED <br> PROMOTIONS FOR) <br> EVENTS BEING <br> SPONSORED BY A <br> CIGARETTE OR <br> SMOKELESS TOBACCO <br> BRAND NAME OR LOGO, ( <br> IN THE PAST 30 <br> DAYS)? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q2 AGE EQ (1829) OR Q4 SMOKNOW EQ $(1,2)$ OR Q23 <br> CIGARNOW EQ $(1,2,3)$ <br> OR Q35 PIPEWTRNOW <br> EQ $(1,2,3)$ OR <br> Q31 PIPEREGNOW EQ <br> $(1,2,3)$ OR Q42 ECIGNOW <br> EQ $(1,2,3)$ OR <br> Q48 CSDNOW EQ $(1,2,3)$ <br> OR Q53 SNUSNOW EQ <br> $(1,2,3)$ OR Q58 DISSNOW <br> EQ (1,2,3)/ |
| 100 | PROMO4 | num | 3 | (HAVE YOU NOTICED PROMOTIONS FOR) CIGARETTES SOLD SINGLY IN <br> STORES, OTHERWISE KNOWN AS 'LOOSIES,' (IN THE PAST 30 DAYS)? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q2 AGE EQ (1829) OR Q4 SMOKNOW EQ (1,2) OR Q23 <br> CIGARNOW EQ $(1,2,3)$ <br> OR Q35 PIPEWTRNOW <br> EQ $(1,2,3)$ OR <br> Q31 PIPEREGNOW EQ <br> $(1,2,3)$ OR Q42 ECIGNOW <br> EQ $(1,2,3)$ OR <br> Q48 CSDNOW EQ $(1,2,3)$ <br> OR Q53 SNUSNOW EQ <br> $(1,2,3)$ OR Q58 DISSNOW <br> EQ (1,2,3)/ |
| 101 | RECVPROMO1A | num | 3 | EVER INTENTIONALLY SUBMITTED YOUR MAILING ADDRESS TO SIGN UP FOR OFFERS OR PROMOTIONS FROM A COMPANY THAT MANUFACTURES ECIGARETTES? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASKALL// |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 101 | RECVPROMO2A | num | 3 | EVER INTENTIONALLY SUBMITTED YOUR MAILING ADDRESS TO SIGN UP FOR OFFERS FROM A TOBACCO COMPANY THAT MANUFACTURES CIGS/OTHER TOBACCO PRODUCTS (NOT INCLUDING E-CIGS)? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASKALL// |
| 101 | RECVPROMO1B | num | 3 | IN THE PAST 6 MONTHS, HAVE YOU RECEIVED ANY MAIL ADDRESSED TO YOU FROM A COMPANY THAT MANUFACTURES ECIGARETTES? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASKALL// |
| 101 | RECVPROMO2B | num | 3 | IN THE PAST 6 MONTHS, HAVE YOU RECEIVED ANY MAIL ADDRESSED TO YOU FROM A TOBACCO COMPANY THAT MANUFACTURES CIGS/OTHER TOBACCO PRODUCTS (NOT INCLUDING ECIGARETTES)? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASKALL// |
| 101 | RECVPROMO1C | num | 3 | DID THE MAIL CONTAIN COUPONS OR OTHER PROMOTIONS (SUCH AS A REBATE OFFER) FOR THE PURCHASE OF ECIGARETTES? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF RECVPROMO1B Q101B EQ 1/ |


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| 101 | RECVPROMO2C | num | 3 | DID THE MAIL CONTAIN COUPONS OR OTHER PROMOTIONS (SUCH AS A REBATE OFFER) FOR TOBACCO PRODUCTS, EXCLUDING ECIGARETTES? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF <br> RECVPROMO2bB Q101F <br> EQ 1/ |
| 101 | RECVPROMO1D | num | 3 | IN THE PAST 6 MONTHS, HAVE YOU RECEIVED ANY EMAIL FROM A COMPANY THAT MANUFACTURES ECIGARETTES? | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL// |
| 101 | RECVPROMO2D | num | 3 | IN THE PAST 6 MONTHS, HAVE YOU RECEIVED ANY EMAIL FROM A TOBACCO COMPANY THAT MANUFACTURES CIGS/OTHER TOBACCO PRODUCTS (NOT <br> INCLUDING ECIGARETTES)? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL// |
| 102 | WARNLOOKCIG | num | 3 | HOW OFTEN, IF AT ALL, HAVE YOU SEEN A HEALTH WARNING ON CIGARETTE PACKS IN THE PAST 30 DAYS? WOULD YOU SAY...? | $\begin{aligned} & -7 \text { = REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1 \text { = VERY OFTEN } \\ & 2=\text { OFTEN } \\ & 3=\text { SOMETIMES } \\ & 4=\text { RARELY } \\ & 5 \text { = NEVER } \end{aligned}$ | Questionnaire | /ASK ALL/ |


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| 103 | WARNSTOPCIG | num | 3 | IN THE PAST 30 DAYS, HAS A HEALTH WARNING ON A CIGARETTE PACK <br> STOPPED YOU FROM HAVING A CIGARETTE WHEN YOU WERE ABOUT TO SMOKE ONE? WOULD YOU SAY...? | $\begin{aligned} -1 & =\text { INAPPLICABLE } \\ -7 & =\text { REFUSED } \\ -8 & =\text { DK } \\ -9 & =\text { NOT ASCERTAINED } \\ 1 & =\text { MANY TIMES } \\ 2 & =\text { A FEW TIMES } \\ 3 & =\text { ONCE } \\ 4 & =\text { NEVER } \\ 5 & =\text { NO URGE TO SMOKE CIG } \\ & \text { IN PAST } 30 \text { DAYS } \end{aligned}$ | Questionnaire | /ASK IF Q102 <br> WARNLOOKCIG EQ <br> (1,2,3,4)/ |
| 104 | WARNAVDCIG | num | 3 | IN THE PAST 30 DAYS, HAVE YOU DONE ANYTHING TO AVOID SEEING HEALTH WARNINGS ON CIGARETTE PACKS? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q102 <br> WARNLOOKCIG EQ $(1,2,3,4) /$ |
| 105 | WARNRISKCIG | num | 3 | HOW OFTEN, IF AT ALL, HAVE YOU THOUGHT ABOUT THE HEALTH RISKS OF SMOKING CIGARETTES IN THE PAST 30 DAYS? WOULD YOU SAY...? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { VERY OFTEN } \\ & 2=\text { OFTEN } \\ & 3=\text { SOMETIMES } \\ & 4=\text { RARELY } \\ & 5=\text { NEVER } \end{aligned}$ | Questionnaire | /ASK IF Q102 <br> WARNLOOKCIG EQ $(1,2,3,4) /$ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 106 | WARNLOOKSMKLS | num | 3 | HOW OFTEN, IF AT ALL, HAVE YOU SEEN HEALTH WARNINGS ON SMOKELESS TOBACCO PACKAGES IN THE PAST 30 DAYS? WOULD YOU SAY...? | $\begin{aligned} & -7 \text { = REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { VERY OFTEN } \\ & 2=\text { OFTEN } \\ & 3 \text { = SOMETIMES } \\ & 4=\text { RARELY } \\ & 5 \text { = NEVER } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 107 | WARNSTOPSMKLS | num | 3 | IN THE PAST 30 DAYS, HAVE THE HEALTH WARNINGS ON SMOKELESS TOBACCO PACKAGES STOPPED YOU FROM USING SMOKELESS TOBACCO WHEN YOU WERE ABOUT TO? WOULD YOU SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { MANY TIMES } \\ & 2=\text { A FEW TIMES } \\ & 3=\text { ONCE } \\ & 4=\text { NEVER } \\ & 5 \text { = NO URGE TO USE } \\ & \text { SMOKELESS TOBACCO IN } \\ & \text { PAST } 30 \text { DAYS } \end{aligned}$ | Questionnaire | /ASK IF Q106 <br> WARNLOOKSMKLS EQ <br> (1,2,3,4)/ |
| 108 | WARNRISKSMKLS | num | 3 | HOW OFTEN, IF AT ALL, HAVE YOU THOUGHT ABOUT THE HEALTH RISKS OF USING SMOKELESS TOBACCO IN THE PAST 30 DAYS? WOULD YOU SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { VERY OFTEN } \\ & 2=\text { OFTEN } \\ & 3=\text { SOMETIMES } \\ & 4=\text { RARELY } \\ & 5=\text { NEVER } \end{aligned}$ | Questionnaire | /ASK IF Q106 <br> WARNLOOKSMKLS EQ <br> (1,2,3,4)/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 109 | WARNNOTICE | num | 3 | IN THE PAST 30 DAYS, HAVE YOU NOTICED ANY HEALTH WARNINGS ON TOBACCO <br> ADVERTISEMENTS IN STORES WHERE TOBACCO PRODUCTS ARE SOLD? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q2 AGE EQ (1829) OR Q4 SMOKNOW EQ $(1,2)$ OR Q23 <br> CIGARNOW EQ $(1,2,3)$ OR Q35 PIPEWTRNOW EQ $(1,2,3)$ OR <br> Q31 PIPEREGNOW EQ $(1,2,3)$ OR Q42 ECIGNOW EQ $(1,2,3)$ OR <br> Q48 CSDNOW EQ $(1,2,3)$ OR Q53 SNUSNOW EQ <br> $(1,2,3)$ OR Q58 DISSNOW EQ (1,2,3)/ |
| 110 | CHEMSEEN | num | 3 | HOW OFTEN HAVE YOU SEEN A LIST OF THE CHEMICALS CONTAINED <br> IN TOBACCO PRODUCTS IN THE PAST TWELVE MONTHS? WOULD YOU SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { NEVER } \\ & 2=\text { RARELY } \\ & 3=\text { SOMETIMES } \\ & 4=\text { OFTEN } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ $(1,2)$ OR Q23 CIGARNOW EQ $(1,2,3)$ OR Q35 PIPEWTRNOW EQ $(1,2,3)$ OR Q31 PIPEREGNOW EQ $(1,2,3)$ OR Q42 ECIGNOW EQ $(1,2,3)$ OR Q48 CSDNOW EQ $(1,2,3)$ OR Q53 SNUSNOW EQ $(1,2,3)$ OR Q58 DISSNOW EQ $(1,2,3)$ |
| 111 | BGHTPAST30D | num | 3 | HAVE YOU BOUGHT ANY CIGARETTES FOR YOURSELF IN THE PAST 30 DAYS? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW $\text { EQ }(1,2) /$ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 112 | BUYQUANT2 | num | 3 | THE LAST TIME YOU BOUGHT CIGARETTES FOR YOURSELF, DID YOU BUY THEM BY THE PACK, BY THE CARTON, OR AS SINGLES OR LOOSE CIGARETTES? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { BY THE PACK } \\ & 2=\text { BY THE CARTON } \\ & 3=\text { AS SINGLES OR LOOSE } \\ & \text { CIGARETTES } \\ & 91=\text { OTHER SPECIFY } \\ & \hline \end{aligned}$ | Questionnaire | /ASK IF Q111 BGHTPAST30D EQ 1/ |
| 112_OTH | BUYQU2OT | char | 30 | ENTER OTHER SPECIFY | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q112 BUYQUANT2 EQ 91/ |
| 113 | COSTPACK2 | num | 8 | WHAT PRICE DID YOU PAY FOR THE LAST PACK OF CIGARETTES YOU BOUGHT? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q112 BUYQUANT2 EQ 1/ |
| 114 | COSTCARTON2 | num | 8 | WHAT PRICE DID YOU PAY FOR THE LAST CARTON OF CIGARETTES YOU BOUGHT? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q112 BUYQUANT2 EQ 2/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 115 | BUYWHERE | num | 3 | THE LAST TIME YOU BOUGHT CIGARETTES FOR YOURSELF, DID YOU BUY THEM...? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1 \text { = CONVENIENCE STORE OR } \\ & \text { GAS STATION } \\ & 2=\text { SUPERMARKET } \\ & 3=\text { LIQUOR STORE } \\ & 4=\text { DRUG STORE } \\ & 5=\text { TOBACCO DISCOUNT } \\ & \text { STORE } \\ & 6=\text { ANOTHER DISCOUNT } \\ & \text { STORE, SUCH AS WAL- } \\ & \text { MART } \\ & 7 \text { = ON AN INDIAN } \\ & \text { RESERVATION } \\ & 8=\text { FROM AVENDING } \\ & \text { MACHINE } \\ & 9=\text { ON THE INTERNET } \\ & 10=\text { FROM ANOTHER } \\ & \text { PERSON } \\ & 91=\text { OTHER } \end{aligned}$ | Questionnaire | /ASK IF Q111 BGHTPAST30D EQ 1/ |
| 115_OTH | BUYWHERE_OTH | char | 30 | ENTER OTHER SPECIFY | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q115 BUYWHERE EQ 91/ |
| 116 | SPECOFFERS | num | 3 | IN THE PAST 30 DAYS, DID YOU USE COUPONS, REBATES, BUY 1 GET 1 FREE, 2 FOR 1, OR ANY OTHER SPECIAL PROMOTIONS WHEN YOU BOUGHT CIGARETTES? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK IF Q111 <br> BGHTPAST30D EQ 1/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 117 | BUYST | num | 3 | DID YOU BUY YOUR <br> PACK/CARTON/CIGARETTE <br> IN YOUR STATE OF <br> RESIDENCE OR <br> SOMEWHERE ELSE? | $\begin{array}{\|l\|} \hline-1=\text { INAPPLICABLE } \\ -7=\text { REFUSED } \\ -8=\text { DK } \\ -9=\text { NOT ASCERTAINED } \\ \text { 1: IN RESPONDENT'S STATE } \\ \text { OF RESIDENCE } \\ \text { 2: IN SOME OTHER STATE } \\ \text { (INCLUDING DC) } \\ \text { 3: IN SOME OTHER COUNTRY } \\ \hline \end{array}$ | Questionnaire | /ASK IF Q111 BGHTPAST30D EQ 1/ |
| 118 | BUYST2 | num | 3 | IN WHAT OTHER <br> STATE/COUNTRY DID YOU <br> BUY YOUR LAST <br> PACK/CARTON/CIGARETTE | $\begin{array}{\|l} \hline-1=\text { INAPPLICABLE } \\ -7=\text { REFUSED } \\ -8=\text { DK } \\ -9=\text { NOT ASCERTAINED } \\ 1: \text { ENTER STATE CODE } \\ 2: \text { ENTER COUNTRY CODE } \end{array}$ | Questionnaire | /ASK IF Q117 BUYST EQ 2 OR 3/ |
| 118 | BUYST2_STATE | num | 3 | IN WHAT OTHER <br> STATE/COUNTRY DID YOU <br> BUY YOUR LAST <br> PACK/CARTON/CIGARETTE | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1: \text { Alabama... } \\ & \ldots .56: \text { Wyoming } \\ & 57: \text { Other (specify) } \end{aligned}$ <br> (Please refer to the appendix for the full list of state codes) | Questionnaire | /ASK IF Q117 BUYST2=1/ |
| 118 | BUYST2_STATE_OTH | Char | 40 | IN WHAT OTHER <br> STATE/COUNTRY DID YOU BUY YOUR LAST <br> PACK/CARTON/CIGARETTE -SPECIFY STATE | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q118 <br> BUYST2_STATE EQ 57/ |


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| 118 | BUYST2_COUNTRY | num | 3 | IN WHAT OTHER <br> STATE/COUNTRY DID YOU <br> BUY YOUR LAST <br> PACK/CARTON/CIGARETTE -COUNTRY CODE | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \\ & 1: \text { Afghanistan... } \\ & \ldots \text { 195: Zimbabwe } \\ & \text { 196: Other } \end{aligned}$ | Questionnaire | /ASK IF Q117 BUYST2=2/ |
| 118 | BUYST2_COUNTRY_OTH | char | 40 | IN WHAT OTHER <br> STATE/COUNTRY DID YOU BUY YOUR LAST <br> PACK/CARTON/CIGARETTE -SPECIFY COUNTRY | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF <br> BUYST2_COUNTRY=196 <br> / |
| 119 | BUYRES | num | 3 | HOW OFTEN DO YOU <br> PURCHASE CIGARETTES <br> FROM AN INDIAN <br> RESERVATION? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & \text { 1=ALL THE TIME } \\ & 2=\text { SOMETIMES } \\ & 3=\text { RARELY } \\ & \text { 4=NEVER } \end{aligned}$ | Questionnaire | /ASK IF Q111 <br> BGHTPAST30D EQ 1/ |
| 120 | BUYST3 | num | 3 | HOW OFTEN DO YOU PURCHASE CIGARETTES FROM A STATE OTHER THAN YOUR STATE OF RESIDENCE? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & \text { 1=ALL THE TIME } \\ & 2=\text { SOMETIMES } \\ & 3=\text { RARELY } \\ & \text { 4=NEVER } \end{aligned}$ | Questionnaire | /ASK IF Q111 BGHTPAST30D EQ 1/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 121 | SMKADDICT | num | 3 | OVERALL, WOULD YOU SAY THAT CIGARETTE SMOKING IS—...? | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { NOT AT ALL ADDICTIVE } \\ & 2=\text { MODERATELY } \\ & \text { ADDICTIVE } \\ & 3=\text { VERY ADDICTIVE } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 122 | CGRADDICT | num | 3 | OVERALL, WOULD YOU SAY THAT CIGAR SMOKING IS—...? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { NOT AT ALL ADDICTIVE } \\ & 2=\text { MODERATELY } \\ & \text { ADDICTIVE } \\ & 3=\text { VERY ADDICTIVE } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 123 | SMKLSADDICT | num | 3 | OVERALL, WOULD YOU SAY THAT SMOKELESS TOBACCO USE IS—...? | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { NOT AT ALL ADDICTIVE } \\ & 2=\text { MODERATELY } \\ & \text { ADDICTIVE } \\ & 3=\text { VERY ADDICTIVE } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 124 | HARMCIG | num | 3 | HOW HARMFUL DO YOU <br> THINK CIGARETTE <br> SMOKING IS TO A <br> PERSON'S HEALTH? | $\begin{aligned} & \hline-7 \text { = REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1 \text { = NOT AT ALL HARMFUL } \\ & 2=\text { MODERATELY HARMFUL } \\ & 3=\text { VERY HARMFUL } \end{aligned}$ | Questionnaire | /ASK ALL/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
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| 125 | HARMCIGAR | num | 3 | HOW HARMFUL DO YOU THINK CIGAR SMOKING IS TO A PERSON'S HEALTH? | $\begin{aligned} & -7 \text { = REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { NOT AT ALL HARMFUL } \\ & 2=\text { MODERATELY HARMFUL } \\ & 3=\text { VERY HARMFUL } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 126 | HARMSMKLS | num | 3 | HOW HARMFUL DO YOU THINK USING SMOKELESS TOBACCO IS TO A PERSON'S HEALTH? | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { NOT AT ALL HARMFUL } \\ & 2=\text { MODERATELY HARMFUL } \\ & 3=\text { VERY HARMFUL } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 127 | HARMECIG | num | 3 | HOW HARMFUL DO YOU THINK USING <br> ECIGARETTES ARE TO A PERSON'S HEALTH? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { NOT AT ALL HARMFUL } \\ & 2=\text { MODERATELY HARMFUL } \\ & 3=\text { VERY HARMFUL } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 128 | HARMLONG | num | 3 | HOW LONG DO YOU THINK SOMEONE HAS TO SMOKE BEFORE IT HARMS THEIR HEALTH? WOULD YOU SAY...? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { LESS THAN A YEAR } \\ & 2=1 \text { YEAR } \\ & 3=5 \text { YEARS } \\ & 4=10 \text { YEARS } \\ & 5=20 \text { YEARS OR MORE } \end{aligned}$ | Questionnaire | /ASK ALL/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 129 | CIGHALF | num | 3 | HOW MUCH DO YOU <br> THINK YOUR RISK OF DEVELOPING A SMOKINGRELATED DISEASE WOULD DECREASE IF YOU CUT THE AMOUNT THAT YOU SMOKE IN HALF? WOULD YOU SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { NOT AT ALL } \\ & 2=\text { A LITTLE } \\ & 3=\text { SOMEWHAT } \\ & 4=\text { A LOT } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ (1,2) OR Q23 CIGARNOW EQ $(1,2,3) /$ |
| 130 | HARMSOME | num | 3 | HOW MUCH DO YOU <br> THINK PEOPLE HARM <br> THEMSELVES WHEN THEY <br> SMOKE CIGARETTES SOME <br> DAYS BUT NOT EVERY <br> DAY? WOULD YOU SAY...? | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { NOT AT ALL } \\ & 2=\text { A LITTLE } \\ & 3=\text { SOMEWHAT } \\ & 4=\text { A LOT } \\ & \hline \end{aligned}$ | Questionnaire | /ASK IF Q2 AGE EQ (1829) OR Q4 SMOKENOW EQ (1,2)/ |
| 131 | SMKLSHALF | num | 3 | HOW MUCH DO YOU THINK YOUR RISK OF DEVELOPING A SMOKINGRELATED DISEASE WOULD DECREASE IF YOU CUT YOUR SMOKELESS TOBACCO USE BY HALF? WOULD YOU SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { NOT AT ALL } \\ & 2=\text { A LITTLE } \\ & 3=\text { SOMEWHAT } \\ & 4=\text { A LOT } \end{aligned}$ | Questionnaire | /ASK IF Q48 CSDNOW EQ $(1,2,3)$ OR Q53 SNUSNOW EQ $(1,2,3)$ OR Q58 DISSNOW EQ (1,2,3)/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 132 | CHEMTHINK | num | 3 | HOW OFTEN HAVE YOU THOUGHT ABOUT THE <br> CHEMICALS CONTAINED <br> IN TOBACCO PRODUCTS IN <br> THE PAST TWELVE <br> MONTHS? WOULD YOU SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { NEVER } \\ & 2=\text { RARELY } \\ & 3=\text { SOMETIMES } \\ & 4=\text { OFTEN } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ $(1,2)$ OR Q23 CIGARNOW EQ $(1,2,3)$ OR Q35 PIPEWTRNOW EQ $(1,2,3)$ OR Q31 PIPEREGNOW EQ $(1,2,3)$ OR Q42 ECIGNOW EQ $(1,2,3)$ OR Q48 CSDNOW EQ $(1,2,3)$ OR Q53 SNUSNOW EQ $(1,2,3)$ OR Q58 DISSNOW EQ (1,2,3)/ |
| 133 | SMOKSTART | num | 3 | IF YOU HAD TO DO IT OVER AGAIN, WOULD YOU HAVE STARTED USING TOBACCO? WOULD YOU SAY...? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { DEFINITELY NOT } \\ & 2=\text { PROBABLY NOT } \\ & 3=\text { PROBABLY YES } \\ & 4=\text { DEFINITELY YES } \end{aligned}$ | Questionnaire | /ASK IF Q4 SMOKNOW EQ $(1,2)$ OR Q23 CIGARNOW EQ $(1,2,3)$ OR Q35 PIPEWTRNOW EQ $(1,2,3)$ OR Q31 PIPEREGNOW EQ $(1,2,3)$ OR Q42 ECIGNOW EQ $(1,2,3)$ OR Q48 CSDNOW EQ $(1,2,3)$ OR Q53 SNUSNOW EQ $(1,2,3)$ OR Q58 DISSNOW EQ $(1,2,3) /$ |
| 134 | HOMERULES2 | num | 3 | NOT COUNTING DECKS, PORCHES, OR GARAGES, INSIDE YOUR HOME, IS SMOKING ...? | $\begin{aligned} & -7 \text { = REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { ALWAYS ALLOWED } \\ & 2 \text { = ALLOWED ONLY AT } \\ & \text { SOME TIMES OR IN SOME } \\ & \text { PLACES } \\ & 3 \text { = NEVER ALLOWED } \end{aligned}$ | Questionnaire | /ASK ALL/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 135 | SHSVEHPOL | num | 3 | NOT COUNTING <br> MOTORCYCLES, IN THE <br> VEHICLES THAT YOU OR <br> FAMILY MEMBERS WHO <br> LIVE WITH YOU OWN OR <br> LEASE, IS SMOKING...? | $\begin{aligned} & \hline-7 \text { = REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1 \text { = ALWAYS ALLOWED } \\ & 2 \text { = SOMETIMES ALLOWED IN } \\ & \text { AT LEAST ONE VEHICLE } \\ & 3 \text { = NEVER ALLOWED IN ANY } \\ & \text { VEHICLE } \\ & \text { 4 = R FAMILY DOES NOT } \\ & \text { OWN OR LEASE A VEHICLE } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 136 | SMOKHOME7D2 | num | 3 | NOT COUNTING DECKS, PORCHES, OR GARAGES, DURING THE PAST 7 DAYS, ON HOW MANY DAYS DID SOMEONE OTHER THAN YOU SMOKED INSIDE YOUR HOME WHILE YOU WERE AT HOME? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 137 | SHSVEHEXP | num | 3 | DURING THE PAST 7 DAYS, ON HOW MANY DAYS DID YOU RIDE IN A VEHICLE <br> WHERE SOMEONE OTHER THAN YOU WAS SMOKING TOBACCO? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK ALL/ |
| 138 | SHSEXPWORK | num | 3 | DURING THE PAST 7 DAYS, ON HOW MANY DAYS DID YOU BREATHE THE SMOKE AT YOUR WORKPLACE FROM SOMEONE OTHER THAN YOU WHO WAS SMOKING TOBACCO | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | /ASK IF Q98 EMPLOY2 $\text { EQ } 1 /$ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 139 | SHSWORKPOL | num | 3 | AT YOUR WORKPLACE, IS SMOKING.....? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ <br> 1: ALLOWED IN BOTH INDOOR AND OUTDOOR AREAS <br> 2: ALLOWED IN OUTDOOR AREAS,NEVER ALLOWED IN ANY INDOOR AREAS <br> 3: ALLOWED IN INDOOR AREAS,NEVER ALLOWED IN ANY OUTDOOR AREAS <br> 4: NEVER ALLOWED IN ANY INDOOR OR OUTDOOR AREA | Questionnaire | /ASK IF Q98 EMPLOY2 EQ 1/ |
| 140 | SHSMUHEXP | num | 3 | HOW OFTEN DOES <br> TOBACCO SMOKE ENTER YOUR LIVING SPACE FROM SOMEWHERE ELSE IN OR AROUND THE BUILDING? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & \text { 1: EVERY DAY } \\ & \text { 2: A FEW TIMES A WEEK } \\ & \text { 3: A FEW TIMES A MONTH } \\ & \text { 4: ONCE A MONTH OR LESS } \\ & \text { 5: NEVER } \end{aligned}$ | Questionnaire | /ASK IF Q99 <br> HOUSINGTYPE EQ (2-6) <br> AND Q134 <br> HOMERULES2 EQ (3)/ |
| 141 | INCLES50 | num | 3 | ANNUAL HH INCOME ALL SOURCE LESS \$50K | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | /ASK ALL/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 141 | INCLES30 | num | 3 | ANNUAL HH INCOME ALL SOURCE LESS \$30K | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | Fill if INCLES40=1 |
| 141 | INCLES40 | num | 3 | ANNUAL HH INCOME ALL SOURCE LESS $\$ 40 \mathrm{~K}$ | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | Fill if INCLES50=1 |
| 141 | INCLES20 | num | 3 | ANNUAL HH INCOME ALL SOURCE LESS \$20K | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | Fill if INCLES30=1 |
| 141 | INCLES70 | num | 3 | ANNUAL HH INCOME ALL SOURCE LESS \$70K | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | Fill if INCLES50=2 |
| 141 | INCLS100 | num | 3 | ANNUAL HH INCOME ALL SOURCE LESS \$100K | $\begin{aligned} & \hline-1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | Fill if INCLES70=2 |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 141 | INCLS150 | num | 3 | ANNUAL HH INCOME ALL SOURCE LESS \$150K | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { YES } \\ & 2=\text { NO } \end{aligned}$ | Questionnaire | Fill if INCLES $100=2$ |
| 142A | SEXUALORIENT1 | num | 3 | DO YOU THINK OF YOURSELF AS...? | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & \text { 1: LESBIAN OR GAY } \\ & \text { 2: STRAIGHT, THAT IS, NOT } \\ & \text { LESBIAN OR GAY } \\ & \text { 3: BISEXUAL } \\ & \text { 4: SOMETHING ELSE } \\ & \text { 5: (DO NOT READ) } \\ & \text { RESPONDENT DOES NOT } \\ & \text { UNDERSTAND RESPONSES } \end{aligned}$ | Questionnaire | /ASK ALL/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 142B | SEXUALORIENT2 | num | 3 | BY SOMETHING ELSE, DO YOU MEAN THAT... | $\begin{array}{\|l\|} \hline-1 \text { = INAPPLICABLE } \\ -7 \text { = REFUSED } \\ -8=\text { DK } \\ -9=\text { NOT ASCERTAINED } \\ \text { 1: YOU ARE NOT STRAIGHT, } \\ \text { BUT IDENTIFY WITH } \\ \text { ANOTHER LABEL } \\ \text { 2: YOU ARE TRANSGENDER, } \\ \text { TRANSSEXUAL OR GENDER } \\ \text { VARIANT. } \\ \text { 3: YOU HAVE NOT FIGURED } \\ \text { OUT YOUR SEXUALITY } \\ \text { 4: YOU DO NOT THINK OF } \\ \text { YOURSELF AS HAVING } \\ \text { SEXUALITY. } \\ \text { 5: YOU DO NOT USE LABELS } \\ \text { TO IDENTIFY YOURSELF. } \\ \text { 6: YOU MADE A MISTAKE } \\ \text { AND DID NOT MEAN TO PICK } \\ \text { THIS ANSWER. } \\ \text { 7: YOU MEAN SOMETHING } \\ \text { ELSE. } \end{array}$ | Questionnaire | /ASK IF Q142A SEXUALORIENT1 EQ 4/ |
| 142C | SEXUALORIENT3 | num | 3 | YOU GAVE "DON'T KNOW" AS AN ANSWER. IS THAT BECAUSE ... | $\begin{array}{\|l} \hline-1=\text { INAPPLICABLE } \\ -7=\text { REFUSED } \\ -8=\text { DK } \\ -9=\text { NOT ASCERTAINED } \\ \text { 1: YOU DON'T UNDERSTAND } \\ \text { THE WORDS. } \\ \text { 2: YOU UNDERSTAND, BUT } \\ \text { HAVE NOT FIGURED OUT } \\ \text { YOUR SEXUALITY } \\ \text { 3: YOU MEAN SOMETHING } \\ \text { ELSE. } \end{array}$ | Questionnaire | /ASK IF Q142A SEXUALORIENT1 EQ -8/ |


| Quest. no. | Variable | Type | Length | QUESTION/LABEL | Format | Source | Skip Pattern |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 142D | SEXUALORIENT_OTH | char | 40 | PLEASE TELL ME WHAT YOU MEAN BY "SOMETHING ELSE"? | $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DON'T KNOW } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Questionnaire | $\begin{aligned} & \text { /ASK IF Q142B } \\ & \text { SEXUALORIENT2=7 OR } \\ & \text { Q142C } \\ & \text { SEXUALORIENT3=3/ } \end{aligned}$ |


| Question no. | Variable | Type | Length | QUESTION/LABEL | Format | Source |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | INCOME2 | num | 8 | INCOME FILL VARIABLE | $\begin{aligned} & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & 1=\text { INCOME LESS THAN 20,000 } \\ & 2=\text { INCOME } 20,000 \text { TO LESS THAN } 30,000 \\ & 3=\text { INCOME } 30,000 \text { TO LESS THAN } 40,000 \\ & 4=\text { INCOMES } 40,000 \text { TO LESS THAN 50,000 } \\ & 5=\text { INCOME } 50,000 \text { TO LESS THAN 70,000 } \\ & 6=\text { INCOME } 70,000 \text { TO LESS THAN } 100,000 \\ & 7=\text { INCOME } 100,000 \text { TO LESS THAN } 150,000 \\ & 8=\text { INCOME } 150,000 \text { OR MORE } \end{aligned}$ | Computed or calculated |
|  | AGEGRP_R | num | 8 | AGE GROUP RECODE | $\begin{aligned} & 1=18-24 \mathrm{yrs} \\ & 2=25-34 \mathrm{yrs} \\ & 3=35-44 \mathrm{yrs} \\ & 4=45-54 \mathrm{yrs} \\ & 5=55-64 \mathrm{yrs} \\ & 6=65+\mathrm{yrs} \\ & 7=\text { UNKNOWN } \end{aligned}$ | Computed or calculated |


| Question no. | Variable | Type | Length | QUESTION/LABEL | Format | Source |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | COSTCARTON2_R | num | 8 | COST PER CARTON RECODE | $\begin{aligned} & 1=10.00-19.99 \\ & 2=20.00-29.99 \\ & 3=30.00-39.99 \\ & 4=40.00-49.99 \\ & 5=50.00-59.99 \\ & 6=60.00-69.99 \\ & 7=70.00-79.99 \\ & 8=80.00-89.99 \\ & 9=90.00-99.99 \\ & 10=100.00-109.99 \\ & 11=110.00-119.99 \\ & 12=120.00-129.99 \\ & 13=130.00-139.99 \\ & -1=\text { INAPPLICABLE }, \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Computed or calculated |


| Question no. | Variable | Type | Length | QUESTION/LABEL | Format | Source |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | COSTPACK2_R | num | 8 | COST PER PACKAGE RECODE | $\begin{aligned} & \hline 0=<0.99 \\ & 1=1.00-1.99 \\ & 2=2.00-2.99 \\ & 3=3.00-3.99 \\ & 4=4.00-4.99 \\ & 5=5.00-5.99 \\ & 6=6.00-6.99 \\ & 7=7.00-7.99 \\ & 8=8.00-8.99 \\ & 9=9.00-9.99 \\ & 10=10.00-10.99 \\ & 11=11.00-11.99 \\ & 12=12.00-12.99 \\ & 13=13.00-13.99 \\ & 14=14.00-14.99 \\ & 15=15.00-15.99 \\ & 16=16.00-16.99 \\ & 17=17.00-17.99 \\ & 18=18.00-18.99 \\ & 19=19.00-19.99 \\ & 20=20 \\ & -1=\text { INAPPLICABLE } \\ & -7 \end{aligned}$ | Computed or calculated |


| $\begin{array}{c}\text { Question } \\ \text { no. }\end{array}$ | Variable | Type | Length | QUESTION/LABEL | Format |
| :---: | :--- | :--- | :---: | :--- | :--- | :--- |$]$| Source |
| :--- |


| Question no. | Variable | Type | Length | QUESTION/LABEL | Format | Source |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | RACEETHNIC | num | 8 | RACE ETHNICITY RECODE | $\begin{aligned} & 1=\text { WHITE ONLY, NON-HISPANIC } \\ & 2 \text { = BLACK ONLY, NON-HISPANIC } \\ & 3 \text { = ASIAN ONLY, NON-HISPANIC } \\ & 4 \text { = NAT. HAWAIIAN OR OTHER PAC. } \\ & \text { ISL. ONLY, NON-HISPANIC } \\ & 5 \text { = AMER. INDIAN, AK NAT. ONLY, } \\ & \text { NON- HISPANIC } \\ & 6=\text { OTHER RACE ONLY, NON-HISPANIC } \\ & 7 \text { = MULTIRACIAL, NON-HISPANIC } \\ & 8=\text { HISPANIC } \\ & 9=\text { UNKNOWN } \end{aligned}$ | Computed or calculated |
|  | RACEETHNIC_R | num | 8 | RACE ETHNICITY RECODE 2 | $\begin{aligned} & 1=\text { WHITE ONLY, NON-HISPANIC } \\ & 2=\text { BLACK ONLY, NON-HISPANIC } \\ & 3=\text { ASIAN ONLY, NON-HISPANIC } \\ & 4=\text { OTHER NON-HISPANIC } \\ & 5=\text { HISPANIC } \\ & 6=\text { UNKNOWN } \end{aligned}$ | Computed or calculated |
|  | SMOKDLYLASTDAYS | num | 8 | DAYS SINCE LAST <br> SMOKED ON A DAILY <br> BASIS RECODE | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Computed or calculated |
|  | SMOKEVER_R | num | 8 | EVER TRIED CIGARETTES RECODE | $\begin{aligned} & 1=\text { YES } \\ & 2=\text { NO } \\ & 3=\text { UNKNOWN } \end{aligned}$ | Computed or calculated |
|  | SMOKLASTDAYS | num | 8 | DAYS OF STOPPED <br> SMOKING CIGARETTES RECODE | $\begin{aligned} & \hline-7=\text { REFUSED } \\ & -8=\text { DK } \\ & -1=\text { INAPPLICABLE } \\ & -9=\text { NOT ASCERTAINED } \end{aligned}$ | Computed or calculated |


| Question no. | Variable | Type | Length | QUESTION/LABEL | Format | Source |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | SMOKSTATUS_R | num | 8 | SMOKING STATUS RECODE (CDC DEFINITION) | $\begin{aligned} & 1=\text { CURRENT EVERYDAY SMOKER } \\ & 2=\text { CURRENT SOME DAYS SMOKER } \\ & 3=\text { FORMER SMOKER } \\ & 4=\text { NEVER SMOKER } \\ & 5=\text { UNKNOWN } \end{aligned}$ | Computed or calculated |
|  | SMOKSTATUS2_R | num | 8 | SMOKING STATUS (2 LEVELS) RECODE | 1 = CURRENT EVERYDAY OR SOME DAYS SMOKER <br> 2 = NEVER SMOKER OR FORMER SMOKER <br> 3 = UNKNOWN | Computed or calculated (only on clean file), |
|  | SEQNO | num | 8 | ANNUAL SEQUENCE NUMBER |  | From sample file |
|  | DENSTR | num | 8 | DENSITY STRATUM | $\begin{aligned} & 1=\text { LISTED NUMBER STRATUM } \\ & 2=\text { NOT LISTED ONE-PLUS BLOCK } \\ & \text { STRATUM } \\ & 3=\text { CELL PHONE STRATUM } \\ & 9=\text { TERRITORY OR JURISDICTION } \end{aligned}$ | From sample file |
|  | GEOSTR | num | 8 | GEOGRAPHIC STRATUM CODE |  | From sample file |
|  | STSTR | num | 8 | SAMPLE DESIGN STRATIFICATION VARIABLE |  | From sample file |
|  | NRECSEL | num | 8 | NUMBER OF SAMPLE <br> RECORDS SELECTED FROM STRATUM |  | From sample file |
|  | NRECSTR | num | 8 | NUMBER OF RECORDS IN STRATUM |  | From sample file |


| Question no. | Variable | Type | Length | QUESTION/LABEL | Format | Source |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | LOADMNTH | num | 3 | SAMPLE MONTH | $\begin{aligned} & 1=\mathrm{OCTOBER} \\ & 2=\mathrm{NOVEMBER} \\ & 3=\mathrm{DECEMBER} \\ & 4=\mathrm{JANUARY} \\ & 5=\mathrm{FEBRUARY} \\ & 6=\mathrm{MARCH} \\ & 7=\mathrm{APRIL} \\ & 8=\mathrm{MAY} \\ & 9=\mathrm{JUNE} \\ & 10=\text { JULY } \\ & 11=\text { AUGUST } \\ & 12=\text { SEPTEMBER } \end{aligned}$ | From sample file |
|  | REPDEPTH | num | 8 | REPLICATE DEPTH |  | From sample file |
|  | REPNO | num | 8 | REPLICATE NUMBER |  | From sample file |
|  | STATEFIPS_S | char | 2 | FIPS STATE CODE FROM SAMPLE FILE | $\begin{aligned} & \text { AK = ALASKA... } \\ & \ldots \mathrm{WY}=\text { WYOMING } \end{aligned}$ <br> (Please refer to the appendix for the list of state abbreviations) | From sample file |
|  | DISPO | num | 8 | FINAL DISPOSITION | $\begin{aligned} & 1.1000=\text { COMPLETED SURVEY } \\ & 1.2000=\text { PARTIALLY COMPLETED } \\ & (\text { THROUGH Q83 MARITAL2) } \end{aligned}$ | From call history |
|  | LANGUAGE | num | 3 | INTERVIEWING <br> LANGUAGE | $\begin{aligned} & 1=\text { ENGLISH } \\ & 2=\text { SPANISH } \end{aligned}$ | From call history |
|  | LNOADULT | num | 3 | NUMBER OF ADULTS AGE 18 OR OLDER IN HH |  | From call history |
|  | LNOMEN | num | 8 | NUMBER OF MEN IN HOUSEHOLD |  | From call history |
|  | LNOWOMEN | num | 8 | NUMBER OF WOMEN IN HOUSEHOLD |  | From call history |


| Question <br> no. | Variable | Type | Length | QUESTION/LABEL | Format | Source |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | NOATTMPTS | num | 8 | NUMBER OF ATTEMPTS |  | From call history |
|  | PHONE_TYPE | num | 3 | TELEPHONE TYPELAND/CELL | $\begin{aligned} & 1=\text { LANDLINE } \\ & 2=\text { CELL PHONE } \end{aligned}$ | From call history |
|  | WT_NATIONAL | num | 8 | THE WEIGHT USED TO CALCULATING NATIONAL ESTIMATES. |  |  |
|  | STATEFIPS_I | num | 8 | WHAT STATE DO YOU LIVE IN? (Imputed State FIPS) | 1: Alabama... <br> ...56: Wyoming <br> (Please refer to the appendix for the full list of state codes) | From call history |
|  | AGEGROUP5_R | num | 8 | AGE GROUP RECODE (5LEVEL) | $\begin{aligned} & 1=18-29 \\ & 2=30-39 \\ & 3=40-49 \\ & 4=50-64 \\ & 5=65+ \\ & 7=\text { UNKNOWN } \end{aligned}$ | Computed or calculated |
|  | SMOKEVER_R2 | num | 8 | EVER TRIED CIGARETTES RECODE | $\begin{aligned} & 1=\text { YES } \\ & 2=\text { NO } \\ & 3=\text { UNKNOWN } \end{aligned}$ | Computed or calculated |
|  | SMOKESTATUS4_R2 | num | 8 | CIGARETTE SMOKING <br> STATUS (4-LEVEL) RECODE <br> (INCLUDE CASES FOR 18-29 <br> YRS OLD) | $\begin{aligned} & 1=\text { CURRENT EVERYDAY SMOKER } \\ & 2=\text { CURRENT SOME DAYS SMOKER } \\ & 3=\text { FORMER SMOKER } \\ & 4=\text { NEVER SMOKER } \\ & 7 \text { = UNKNOWN } \end{aligned}$ | Computed or calculated |
|  | SMOKESTATUS3_R2 | num | 8 | SMOKING STATUS (3 <br> LEVELS) RECODE <br> (INCLUDE CASES FOR 18-29 <br> YRS OLD) | $\begin{aligned} & 1=\text { CURRENT SMOKER } \\ & 2=\text { FORMER SMOKER } \\ & 3=\text { NEVER SMOKER } \\ & 7=\text { UNKNOWN } \end{aligned}$ | Computed or calculated |


| Question no. | Variable | Type | Length | QUESTION/LABEL | Format | Source |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | SMOKESTATUS2_R2 | num | 8 | SMOKING STATUS (2 <br> LEVELS) RECODE <br> (INCLUDE CASES FOR 18-29 <br> YRS OLD) | 1 = CURRENT EVERYDAY OR SOME DAYS SMOKER <br> 2 = NEVER SMOKER OR FORMER SMOKER <br> 7 = UNKNOWN | Computed or calculated |
|  | CCIGAR | num | 8 | CURRENT CIGAR USE | $\begin{aligned} & 1=\text { YES } \\ & 2=\text { NO } \\ & 3=\text { UNKNOWN } \end{aligned}$ | Computed or calculated |
|  | CECIG | num | 8 | CURRENT E-CIGARETTE USE | $\begin{aligned} & \hline 1=\text { YES } \\ & 2=\text { NO } \\ & 3=\text { UNKNOWN } \end{aligned}$ | Computed or calculated |
|  | CWTRPIPE | num | 8 | CURRENT <br> WATERPIPE/HOOKAH USE | $\begin{array}{\|l} \hline 1=\text { YES } \\ 2=\text { NO } \\ 3=\text { UNKNOWN } \end{array}$ | Computed or calculated |
|  | CTRADPIPE | num | 8 | CURRENT TRADITIONAL PIPE USE | $\begin{array}{\|l\|} \hline 1=\text { YES } \\ 2=\text { NO } \\ 3=\text { UNKNOWN } \end{array}$ | Computed or calculated |
|  | CSMKLS | num | 8 | CURRENT SMOKELESS TOBACCO (CHEWING, SNUFF OR DIP) USE | $\begin{array}{\|l\|} \hline 1 \\ \hline \end{array}=\text { YES }$ | Computed or calculated |
|  | CSNUS | num | 8 | CURRENT SNUS USE | $\begin{array}{\|l\|l\|} \hline 1 & =\text { YES } \\ 2 & =\text { NO } \\ 3=\text { UNKNOWN } \end{array}$ | Computed or calculated |
|  | CDISS | num | 8 | CURRENT DISSOLVABLE TOBACCO USE | $\begin{aligned} & 1=\text { YES } \\ & 2=\text { NO } \\ & 3=\text { UNKNOWN } \end{aligned}$ | Computed or calculated |


| FORMAT FOR STATEFIPS |  |  |  |
| :---: | :---: | :---: | :---: |
| $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & \text { AK }=\text { ALASKA } \\ & \text { AL }=\text { ALABAMA } \\ & \text { AR }=\text { ARKANSAS } \\ & \text { AZ }=\text { ARIZONA } \\ & \mathrm{CA}=\text { CALIFORNIA } \\ & \mathrm{CO}=\text { COLORADO } \\ & \mathrm{CT}=\text { CONNECTICUT } \\ & \text { DC }=\text { DISTRICT OF COLUMBIA } \\ & \text { DE }=\text { DELAWARE } \\ & \text { FL }=\text { FLORIDA } \end{aligned}$ | $\begin{aligned} & \text { GA = GEORGIA } \\ & \text { HI = HAWAII } \\ & \text { IA = IOWA } \\ & \text { ID = IDAHO } \\ & \text { IL = ILLINOIS } \\ & \text { IN = INDIANA } \\ & \text { KS = KANSAS } \\ & \text { KY = KENTUCKY } \\ & \text { LA = LOUISIANA } \\ & \text { MA = MASSACHUSETTS } \\ & \text { MD = MARYLAND } \\ & \text { ME = MAINE } \\ & \text { MI = MICHIGAN } \\ & \text { MN = MINNESOTA } \end{aligned}$ | $\begin{aligned} & \text { MO = MISSOURI } \\ & \text { MS = MISSISSIPPI } \\ & \text { MT }=\text { MONTANA } \\ & \text { NC }=\text { NORTH CAROLINA } \\ & \text { ND }=\text { NORTH DAKOTA } \\ & \text { NE }=\text { NEBRASKA } \\ & \text { NH }=\text { NEW HAMPSHIRE } \\ & \text { NJ }=\text { NEW JERSEY } \\ & \text { NM }=\text { NEW MEXICO } \\ & \text { NV }=\text { NEVADA } \\ & \text { NY }=\text { NEW YORK } \\ & \text { OH }=\text { OHIO } \\ & \text { OK }=\text { OKLAHOMA } \\ & \text { OR }=\text { OREGON } \end{aligned}$ | $\begin{aligned} & \text { PA = PENNSYLVANIA } \\ & \text { RI = RHODE ISLAND } \\ & \text { SC = SOUTH CAROLINA } \\ & \text { SD = SOUTH DAKOTA } \\ & \text { TN = TENNESSEE } \\ & \text { TX = TEXAS } \\ & \text { UT = UTAH } \\ & \text { VA = VIRGINIA } \\ & \text { VT = VERMONT } \\ & \text { WA = WASHINGTON } \\ & \text { WI = WISCONSIN } \\ & \text { WV = WEST VIRGINIA } \\ & \text { WY = WYOMING } \end{aligned}$ |
| $\begin{aligned} & -1=\text { INAPPLICABLE } \\ & -7=\text { REFUSED } \\ & -8=\text { DK } \\ & -9=\text { NOT ASCERTAINED } \\ & \text { 1: Alabama } \\ & \text { 2: Alaska } \\ & \text { 4: Arizona } \\ & \text { 5: Arkansas } \\ & \text { 6: California } \\ & \text { 8: Colorado } \\ & \text { 9: Connecticut } \\ & \text { 10: Delaware } \\ & \text { 11: District of Columbia } \\ & \text { 12: Florida } \end{aligned}$ | 13: Georgia <br> 15: Hawaii <br> 16: Idaho <br> 17: Illinois <br> 18: Indiana <br> 19: Iowa <br> 20: Kansas <br> 21: Kentucky <br> 22: Louisiana <br> 23: Maine <br> 24: Maryland <br> 25: Massachusetts <br> 26: Michigan <br> 27: Minnesota | BUYST2_STATE <br> 28: Mississippi <br> 29: Missouri <br> 30: Montana <br> 31: Nebraska <br> 32: Nevada <br> 33: New Hampshire <br> 34: New Jersey <br> 35: New Mexico <br> 36: New York <br> 37: North Carolina <br> 38: North Dakota <br> 39: Ohio <br> 40: Oklahoma <br> 41: Oregon | 42: Pennsylvania <br> 44: Rhode Island <br> 45: South Carolina <br> 46: South Dakota <br> 47: Tennessee <br> 48: Texas <br> 49: Utah <br> 50: Vermont <br> 51: Virginia <br> 53: Washington <br> 54: West Virginia <br> 55: Wisconsin <br> 56: Wyoming <br> 57: Other (specify) |


| FORMAT FOR BUYST2_COUNTRY |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| $-1=$ INAPPLICABLE <br> -9 = NOT ASCERTAINED <br> 1: Afghanistan... <br> 2: Albania <br> 3: Algeria <br> 4: Andorra <br> 5: Angola <br> 6: Antigua and Barbuda <br> 7: Argentina <br> 8: Armenia <br> 9: Australia <br> 10: Austria <br> 11: Azerbaijan <br> 12: Bahamas <br> 13: Bahrain <br> 14: Bangladesh <br> 15: Barbados <br> 16: Belarus <br> 17: Belgium <br> 18: Belize <br> 19: Benin <br> 20: Bhutan <br> 21: Bolivia <br> 22: Bosnia and Herzegovina <br> 23: Botswana <br> 24: Brazil <br> 25: Brunei <br> 26: Bulgaria <br> 27: Burkina Faso <br> 28: Burundi <br> 29: Cambodia <br> 30: Cameroon <br> 31: Canada <br> 32: Cape Verde | 33: Central African <br> Republic <br> 34: Chad <br> 35: Chile <br> 36: China <br> 37: Colombia <br> 38: Comoros <br> 39: Congo, Democratic <br> Republic of the <br> 40: Congo, Republic of the <br> 41: Costa Rica <br> 42: Côte d'Ivoire <br> 43: Croatia <br> 44: Cuba <br> 45: Cyprus <br> 46: Czech Republic <br> 47: Denmark <br> 48: Djibouti <br> 49: Dominica <br> 50: Dominican Republic <br> 51: Ecuador <br> 52: Egypt <br> 53: El Salvador <br> 54: Equatorial Guinea <br> 55: Eritrea <br> 56: Estonia <br> 57: Ethiopia <br> 58: Federated States of Micronesia <br> 59: Fiji <br> 60: Finland <br> 61: France <br> 62: Gabon <br> 63: Gambia <br> 64: Georgia | 65: Germany <br> 66: Ghana <br> 67: Greece <br> 68: Grenada <br> 69: Guatemala <br> 70: Guinea <br> 71: Guinea-Bissau <br> 72: Guyana <br> 73: Haiti <br> 74: Honduras <br> 75: Hungary <br> 76: Iceland <br> 77: India <br> 78: Indonesia <br> 79: Iran <br> 80: Iraq <br> 81: Ireland <br> 82: Israel <br> 83: Italy <br> 84: Jamaica <br> 85: Japan <br> 86: Jordan <br> 87: Kazakhstan <br> 88: Kenya <br> 89: Kiribati <br> 90: Kuwait <br> 91: Kyrgyzstan <br> 92: Laos <br> 93: Latvia <br> 94: Lebanon <br> 95: Lesotho <br> 96: Liberia <br> 97: Libya <br> 98: Liechtenstein | 99: Lithuania <br> 100: Luxembourg <br> 101: Macedonia <br> 102: Madagascar <br> 103: Malawi <br> 104: Malaysia <br> 105: Maldives <br> 106: Mali <br> 107: Malta <br> 108: Marshall Islands <br> 109: Mauritania <br> 110: Mauritius <br> 111: Mexico <br> 112: Moldova <br> 113: Monaco <br> 114: Mongolia <br> 115: Montenegro <br> 116: Morocco <br> 117: Mozambique <br> 118: Myanmar <br> 119: Namibia <br> 120: Nauru <br> 121: Nepal <br> 122: Netherlands <br> 123: New Zealand <br> 124: Nicaragua <br> 125: Niger <br> 126: Nigeria <br> 127: North Korea <br> 128: Norway <br> 129: Oman <br> 130: Pakistan <br> 131: Palau <br> 132: Panama | 133: Papua New Guinea <br> 134: Paraguay <br> 135: Peru <br> 136: Philippines <br> 137: Poland <br> 138: Portugal <br> 139: Qatar <br> 140: Romania <br> 141: Russia <br> 142: Rwanda <br> 143: Saint Kitts and Nevis <br> 144: Saint Lucia <br> 145: Saint Vincent and the Grenadines <br> 146: Samoa <br> 147: San Marino <br> 148: São Tomé and Príncipe <br> 149: Saudi Arabia <br> 150: Senegal <br> 151: Serbia <br> 152: Seychelles <br> 153: Sierra Leone <br> 154: Singapore <br> 155: Slovakia <br> 156: Slovenia <br> 157: Solomon Islands <br> 158: Somalia <br> 159: South Africa <br> 160: South Korea <br> 161: South Sudan <br> 162: Spain <br> 163: Sri Lanka <br> 164: Sudan <br> 165: Suriname | 166: Swaziland <br> 167: Sweden <br> 168: Switzerland <br> 169: Syria <br> 170: Taiwan <br> 171: Tajikistan <br> 172: Tanzania <br> 173: Thailand <br> 174: Timor-Leste <br> 175: Togo <br> 176: Tonga <br> 177: Trinidad and Tobago <br> 178: Tunisia <br> 179: Turkey <br> 180: Turkmenistan <br> 181: Tuvalu <br> 182: Uganda <br> 183: Ukraine <br> 184: United Arab Emirates <br> 185: United Kingdom <br> 186: United States <br> 187: Uruguay <br> 188: Uzbekistan <br> 189: Vanuatu <br> 190: Vatican City <br> 191: Venezuela <br> 192: Vietnam <br> 193: Yemen <br> 194: Zambia <br> 195: Zimbabwe <br> 196: Other |

## FORMAT FOR STATEFIPS_I

| 1: Alabama | 20: Kansas | 36: New York | 54: West Virginia |
| :--- | :--- | :--- | :--- |
| 2: Alaska | 21: Kentucky | 37: North Carolina |  |
| 4: Arizona | 22: Louisiana | 38: North Dakota |  |
| 5: Arkansas | 23: Maine | 39: Ohio |  |
| 6: California | 24: Maryland | 40: Oklahoma |  |
| 8: Colorado | 25: Massachusetts | 41: Oregon |  |
| 9: Connecticut | 26: Michigan | 42: Pennsylvania |  |
| 10: Delaware | 27: Minnesota | 44: Rhode Island |  |
| 11: District of Columbia | 28: Mississippi | 45: South Carolina |  |
| 12: Florida | 29: Missouri | 46: South Dakota |  |
| 13: Georgia | 30: Montana | 47: Tennessee |  |
| 15: Hawaii | 31: Nebraska | 48: Texas |  |
| 16: Idaho | 32: Nevada | 49: Utah |  |
| 17: Illinois | 33: New Hampshire | 50: Vermont |  |
| 18: Indiana | 34: New Jersey | 51: Virginia |  |
| 19: Iowa | 35: New Mexico | 53: Washington |  |

## FORMAT FOR STATEFIPS_S

| AK = ALASKA | IL = ILLINOIS | ND = NORTH DAKOTA | TN = TENNESSEE |
| :---: | :---: | :---: | :---: |
| AL $=$ ALABAMA | $\mathrm{IN}=$ INDIANA | NE = NEBRASKA | TX = TEXAS |
| AR $=$ ARKANSAS | KS $=$ KANSAS | NH = NEW HAMPSHIRE | UT = UTAH |
| AZ $=$ ARIZONA | KY = KENTUCKY | NJ = NEW JERSEY | VA = VIRGINIA |
| CA $=$ CALIFORNIA | LA $=$ LOUISIANA | NM = NEW MEXICO | VT = VERMONT |
| CO = COLORADO | MA = MASSACHUSETTS | NV = NEVADA | WA = WASHINGTON |
| CT = CONNECTICUT | MD = MARYLAND | NY = NEW YORK | WI = WISCONSIN |
| DC = DISTRICT OF COLUMBIA | ME = MAINE | $\mathrm{OH}=\mathrm{OHIO}$ | WV = WEST VIRGINIA |
| DE = DELAWARE | MI $=$ MICHIGAN | OK = OKLAHOMA | WY = WYOMING |
| FL = FLORIDA | MN = MINNESOTA | OR = OREGON |  |
| GA = GEORGIA | MO = MISSOURI | PA = PENNSYLVANIA |  |
| $\mathrm{HI}=$ HAWAII | MS $=$ MISSISSIPPI | RI = RHODE ISLAND |  |
| IA = IOWA | MT = MONTANA | SC = SOUTH CAROLINA |  |
| ID = IDAHO | NC $=$ NORTH CAROLINA | SD = SOUTH DAKOTA |  |


[^0]:    ${ }^{1}$ Standard Definitions Final Dispositions of Case Codes and Outcome Rates for Surveys, Revised 2011, RDD Telephone Surveys, In-Person Household Surveys, Mail Surveys of Specifically Named Persons, Internet Surveys of Specifically Named Persons, AAPOR
    http://www.aapor.org/AM/Template.cfm?Section=Standard Definitions2\&Template=/CM/ContentDisplay.cfm\&ContentID=31 56.

[^1]:    ${ }^{3}$ The stratification in to active and non-active cell phone numbers is based on Marketing Systems Group's Cell-WINS (Cellular Working Identification Number Service) -- a real-time, non-intrusive screening process that accurately identifies inactive telephone numbers within a Cellular RDD sample.

[^2]:    ${ }^{5}$ http://www.cdc.gov/nchs/data/nhis/earlyrelease/wireless_state_201412.pdf
    ${ }^{6}$ http://www.census.gov/acs/www/data_documentation/public_use_microdata_sample/
    ${ }^{7}$ Beimer, P. P., and Christ, S. L. (2008). Weighting Survey Data. In E.D. de Leeuw, J. J. Hox, and D. A. Dillman (Eds.), International Handbook of Survey Methodology (317-341). New York: Psychology Press, Taylor\&Francis.
    ${ }^{8}$ Kish, L. (1965). Survey Sampling. New York: Wiley-Interscience Publication.

[^3]:    ${ }^{9}$ http://www.census.gov/acs/www/data_documentation/public_use_microdata_sample/
    ${ }^{10} \mathrm{http}: / / \mathrm{www} . \mathrm{cdc} . \mathrm{gov} / \mathrm{nchs} / \mathrm{data} / \mathrm{nhis} /$ earlyrelease/wireless_state_201412.pdf

[^4]:    ${ }^{11}$ Izrael, D, Battaglia, MP, Frankel, MR. 2009. Extreme Survey Weight Adjustment as a Component of Sample Balancing (a.k.a. Raking). SAS Global Forum.

