



***Healthy Aging in Neighborhoods of Diversity  
across the Life Span Study***

***Dietary Supplement Documentation Codebook***

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**HANDLS 2007 Documentation**  
**Questionnaire Section: Sample Person Interview**

**WAVES of Coverage: Wave 3, Wave 4**

<b>Component Description</b>	The Dietary Supplements section provides personal interview data on use of over the counter and prescription vitamins, minerals, and antacids and other dietary supplements. This section also includes supplement name, ingredients, amounts, and serving size.
<b>Eligible Sample</b>	All sample persons (SP). Survey participants are 30 to 64 years of age at baseline.
<b>Mode of Administration</b>	Telephone interview.
<b>Data Files</b>	File 1: Supplement Counts File 2: Supplement Records File 3: Supplement Information File 4: Ingredient Information File 5: Supplement Blend
<b>Appendices</b>	1. Wave 3 Supplement Questionnaire 2. Wave 4 Supplement Questionnaire 3. Matching Codes 4. NHANES Created Default Supplements and Antacids 5. Source of Supplement Information 6. Formulation Type 7. Rules for Classifying Ingredients 8. Reported Dosage Units 9. Reasons for Taking Supplements 10. Label Serving Size Units 11. Ingredient Units 12. Ingredient Classification 13. Description of Statistical Analysis to Create Supplemental Nutrient File

## Data Collection

For the exact questions participants are asked see [Appendix 1: Dietary Supplements Questionnaire](#). During a telephone interview, researchers administer a computer based dietary supplement questionnaire following the completion of the 24 hour dietary recall. Survey participants are asked if they have taken any over the counter or prescription vitamins, minerals, and antacids or any other dietary supplement in the previous 24 hours. Those who answer “yes” are asked to get the dietary supplement containers of all the products used.

For each dietary supplement reported, the interviewer enters the product’s complete name from the container into a computer. If no container is available, the interviewer asks the participant to verbally report the name of the dietary supplement. The interviewer enters all the information into the questionnaire. The manufacturer is entered manually for less commonly known products. The process is repeated for non-prescription antacids. The process is then repeated for prescription vitamin/minerals and antacids.

Participants are asked how long they have been taking the dietary supplement and how much they take daily. Participants are also asked for what reason the supplement is taken, and if the supplement is recommended by a doctor.

**Matching a reported supplement to known supplement:**

Trained nutritionists match the product names entered (including prescription supplements and antacids containing calcium or magnesium) to a known product when possible. These matches are made with varying degrees of precision, and a matching code (MATCH) accompanies each match ([Appendix 3: Matching Codes](#)). Briefly, the codes are: 1) Exact or near exact match; 2) Probable match; 3) Generic match; 4); Reasonable match; and 5) Default match. In some cases no match can be made with any certainty. These products are coded 6) No match. Products whose names were reported as “Refused” or “Don’t know” have matching codes of 7 and 9, respectively.

Nutritionists communicate with many major manufacturing company representatives to determine when various product reformulations become available. Reported supplements are matched with known supplements based upon reported supplement name as entered by the interviewer and the product version on the market at that time, if known. Based upon manufacturer advice, a lag time of 5 months after new product market entry is used in matching recorded products to these new products. Despite these precautions, there is no guarantee that the product taken was not an older or newer product than the one to which it was matched.

Generic and default dietary supplements were created and entered into the supplement database. Reported supplements for which the strength of all ingredients was known were matched to a generic supplement, i.e. one which had no brand name. These were generally single ingredient supplements which included a strength (e.g. vitamin C 500 mg) or multiple vitamins and/or mineral supplements made by a private label manufacturer that was known to us and for which we had a label with identical ingredients and strengths (e.g. brand X all-purpose multivitamin was reported, and we had a label for brand Y, made by the same manufacturer). These matches are coded as 3. When all ingredient strengths were not known, the supplement was matched to a default supplement where possible. Defaults were created for single ingredient and multiple ingredient supplements based on NHANES data that matches the year of HANDLS study data collection of most frequently reported supplements of that type. These matches were coded as 5. Created default and generic products and the actual products or strengths that were assigned to these defaults are listed in [Appendix 4: NHANES created default supplements and antacids](#)).

**Dietary Supplements Database Overview:**

HANDLS attempts to obtain a label for each supplement reported by a participant from sources such as the manufacturer or retailer, the Internet, company catalogs, and the Physician’s Desk Reference



(PDR). Selected label information is then entered into the HANDLS Dietary Supplement Database including: supplement name; manufacturer; serving size; form of serving size; ingredients and amounts, including an operator to indicate that the amount is less than, more than or equal to the amount. The ingredient information entered into the database is taken directly from the supplement facts box on the label or carton, if available, or the equivalent from other sources.

HANDLS does not verify the actual composition of supplements reported: the database is based on label information, not testing. The best information source is the label itself, but when this cannot be obtained, other sources are used. Information from other sources may not always be an accurate reflection of what is actually on the supplement label. This is true for the supplement's apparent name as well as for the ingredients. Differences from what appears on the label are particularly noted for information from the Internet (name and ingredients), the PDR (name), and supplement carton (name). In addition, supplements may change the appearance of a label and thus the apparent name without changing the content or may change content with minimal change to the label, or may change both. The source of the supplement information is included in the data release. (See [Appendix 5: Source of Supplement Information.](#))

Some supplements contain proprietary blends of ingredients, generally non-nutrients. Usually an amount is specified for the blend but not individual ingredients. In such cases, the blend and its amount are entered into the database, but the individual ingredients of the blend are listed without any amounts. A few supplement labels list ingredients but no amounts at all, so the amounts are missing.

Additional information about the supplement is entered by nutritionists into the database.

1. Supplement formulation type (standard, mature, and and prenatal: [Appendix 6](#)) is based upon the appearance of the label or specific wording indicating the targeted users.
2. Ingredients are classified as vitamin; mineral; amino acid; botanical; fiber; fat; carbohydrate; or other ([Appendix 7: Rules for classifying ingredients](#)).  
Of particular note is that we have classified the ingredient beta-carotene as "other," not a vitamin. This ingredient information is later tallied to provide the number of ingredients of each type in the supplement.
3. Generic and default supplements are also entered into the database to be matched with supplements for which brand-specific matches cannot be made.

### [Specific Variables and Edits](#)

**MATCH:** (matching code): Supplements are recorded in the telephone interview with varying degrees of accuracy and completeness, so a system to determine how certain a supplement recorded during the interview matches with the actual supplement label. Briefly, the codes are: 1) Exact or near exact match; 2) Probable match; 3) Generic match; 4); Reasonable match; and 5) Default match. In some cases no match can be made with any certainty. These products are coded 6) No match. Products whose names were reported as “Refused” or “Don’t know” have matching codes of 7 and 9, respectively.

Note: Analysts should be aware that for default matches and matches that chose between several similarly named supplements, there is less certainty that the ingredients and ingredient amounts in the supplement assigned exactly match those in the supplement actually taken. Additionally, HANDLS cannot guarantee in any case that the matched product was the exact product taken or even that any product actually was taken, as these data are self-reported.

**CNTOTCVIT** - total number of nonprescription vitamin/mineral supplements taken per respondent.

**CNTANTA** - total number of non-prescription antacids taken per respondent.

**CNTRXN** - total number of prescription vitamin/mineral supplement and antacids taken per respondent.

**CONTAINER** - denotes if the dietary supplement container was available during the telephone interview.

**LENGTH** - (How Long Supplement Taken) is converted to days for release by multiplying years by 365; months by 30.4; and weeks by 7.

**QUANTITY/DOSE** - Quantity and reported dosage form ([Appendix 8](#)) of supplement taken daily as recorded by interviewer.

**REASON** – Reasons for taking supplement ([Appendix 9](#)).

## Variables from the Dietary Supplement Database

### **SUPID (Supplement ID Number)**

These are numbers assigned by staff for each product entered.

Note: All Supplement ID numbers are 10 digits long.

All NHANES Supplement IDs begin with the number '1'. The next 3 digits (positions 2-4) are '888' if the supplement was created by NCHS as a generic or default product; otherwise the digits in positions 2-4 are coded '000'. The next 4 digits (positions 5-8) are assigned by NHANES staff and do not indicate anything about the product. The last 2 digits (positions 9-10) indicate formulations of the same supplement. The first formulation entered into the database = 00, the first reformulation = 01, the next = 02, etc. Note that these are reformulations of the same product: different versions (e.g. liquid vs. tablet, with iron vs. without iron, regular vs. high potency) have different 4 digit numbers (positions 5-8).

For HANDLS supplements the Supplement ID begins with a '4'. The next 3 digits (positions 2-4) are '888' if the supplement was created by HANDLS as a generic or default product; otherwise the digits in positions 2-4 are coded '000'. The next 4 digits (positions 5-8) are assigned using the following criteria and identify the category of the product. The list below defines of what each number in the fifth position means.

If the fifth number is:

- 1- over-the-counter multivitamin/mineral
- 2- over-the-counter single or double element
- 3- fish oils
- 4- over-the-counter antacids
- 5- prescription vitamin/mineral supplement
- 6- prescription antacids
- 7- herbals/botanicals
- 8- laxatives
- 9- weight loss supplements

Positions 6-8 are used to enter a unique code for individual products. The last 2 digits (positions 9-10) indicate formulations of the same supplement product. The first formulation entered into the database = 00, the first reformulation = 01, the next = 02, etc. Note that these are reformulations of the same product and same form.

### **SUPP (Name of Supplement)**

This is the name from the supplement front label which is entered into the database. Matching the supplement from the interviewers' record to an actual product label is made with varying degrees of certainty. Product names that were entered as "refused" or "don't know" are named "7" and "9", respectively.

Note: For some entries made by interviewers, no corresponding product label could be found nor could a reasonable default product be



assigned. These entries are counted as supplements, since there is no evidence that they are not supplements. The MATCH code was entered as a “6”.

Note: HANDLS collects brand name information on supplements whenever feasible, to ensure as much accuracy as possible in finding the label information for the exact product taken, and providing exact ingredient information for this product to data users. Products with very similar names but manufactured by different companies may contain different ingredient strengths.

Brand names are released for supplements matched with a high degree of product or brand certainty, as this information may be useful in the design of other surveys. However matching of brand names to reported products may contain errors, and many matches are made to generic or default products, especially for private label brands. Thus, analyses of consumer usage by brand name using HANDLS data may not be accurate and is not recommended.

#### **SOURCE (Supplement Information Source)**

The source of each product label is recorded into the database. These source codes are listed in [Appendix 5](#). Generic and default products do not have a source code.

#### **FORM (Formulation Type)**

The type of formula is recorded into the database. These codes are listed in [Appendix 6](#).

#### **SERVQ (Serving Size Quantity)**

This is the “product dosage quantity”, which is recorded from the product label supplements facts panel.

Note: When calculating the amount of a nutrient consumed from supplements, it is important to take serving size into consideration. For some supplements, the serving size may be more than one tablet, drop, teaspoon, etc. In such cases, a person taking only one tablet, for example, would only be getting a percentage of the amount listed for that ingredient. In addition, the ingredient listed may be a compound (e.g. calcium carbonate), only the amount of elemental mineral was included in the database.

#### **SERVUNIT (Serving Size Unit)**

This is the “serving size unit”, which is recorded from the product label supplements facts panel. The codes are listed in [Appendix 10](#).

#### **SERVA (Alternative Serving Size)**

This is listed in labels for some products. Not all products offer an alternative serving size.

Label may include alternative serving size (e.g. 1 dropperful = 1 mL).

**INGID (Ingredient ID)**

This is the ingredient ID created in our database for each ingredient recorded from the product label supplements facts panel.

**INGR (Ingredient name)**

Ingredient names are recorded from the product label supplements facts panel.

**INGOPER (Ingredient operator)**

This is a symbol =, <, or > that comes from the product label supplements facts panel.

**INGQTY (Ingredient quantity)**

Ingredient quantity is recorded for each ingredient listed from the product label supplements facts panel.

**INGUNIT (Ingredient unit)**

Ingredient unit is recorded for each ingredient listed from the product label supplements facts panel. [Appendix 11](#) lists the code for these.

**INGCAT (Ingredient category)**

There are ingredient categories: Vitamin, Mineral, Botanical, Amino Acid, Fat, Fiber, Carbohydrate, and Others. These are assigned by HANDLS nutritionists. [Appendix 12](#) lists the code for these.

**CNTVIT** : number of vitamins in the product

**CNTMIN** : number of minerals in the product

**CNTAA** : number of amino acids in the product

**CNTBOT** : number of botanicals in the product

**CNTFAT** : number of ingredients classified as fat in a product

**CNTCHO** : number of carbohydrates and sugars in the product

**CNTFIBER** : number of fiber elements in a product.

**CNTO** : number of other ingredients in the product

Note: For each supplement, this is the number (count) of ingredients in each ingredient category (vitamin, mineral, amino acid, botanical, fat, fiber, carbohydrate, and other) listed in the facts box on the label, including ingredients listed within blends. In a few products with blends, the same vitamin or mineral was listed as both an ingredient with an amount and as part of a blend. In these cases, only the

vitamin or mineral was only counted as one.

**BLENDFLAG (Blend Flag)**

This indicator variable denotes whether an ingredient is a blend or not a blend.

**BLENDID (Blend component id)**

These are ingredient ID numbers for blend ingredients.

**BLENDNAME (Blend component name)**

These are ingredient names for blend ingredients. Blends in products will not give the actual breakdown of ingredient quantities in the blend. The ingredients will usually just be listed, and most of the time a whole blend amount is given.

**BLENDCAT (Blend component category)**

There are ingredient categories for each blend ingredient: Vitamin, Mineral, Botanical, Others, Amino Acid. These are assigned by NCHS staff. [Appendix 7](#) lists the code for these.

Trained nutritionists reviewed incoming data and matched reported to known supplements from the NHANES and HANDLS database, where possible; sought additional supplement labels if feasible; assigned generic or default supplements as appropriate; and assigned matching codes as described in [Appendix 3: Matching Codes](#). Scheduled coding meetings were held with the supervisor, who has a PhD in nutrition and is an RD, to discuss coding questions. All coding was reviewed by the coding supervisor and adjusted as necessary.

## Data Files and Structure

The data relating to dietary supplements are included in five separate files. The files can be linked by respondent id, supplement id, or ingredient id. This structure is used to avoid unwieldy record length. The content of each file is described below.

<b>File 1: Supplement Counts</b>	
<b>Variable Name</b>	<b>Label</b>
HANDLSID	Respondent ID number
WAVE	Wave number
INTERVIEW	Interview number
OTCVIT	Any OTC dietary supplements taken?
CNTOTCVIT	Total # of dietary supplements taken
ANTA	Any non-prescription antacids taken?
CNTANTA	Total # of non-prescription antacids taken
RXN	Any prescription vitamins, minerals, antacids taken?
CNTRXN	Total # of prescription vitamins, minerals, antacids

## File 2: Supplement Records

Variable Name	Label
HANDLSID	Respondent ID number
WAVE	Wave number
INTERVIEW	Interview number
SUPPID	Supplement ID number
SUPP	Supplement name
CONTAINER	Was container seen?
MATCH	Matching code (Appendix 3)
LENGTH	How long supplement taken (days)
QUANTITY	Quantity of supplement taken per day
DOSE	Dosage units (Appendix 8)
REASON	Reasons for taking supplement (Appendix 9)

<b>File 3: Supplement Information</b>	
<b>Variable Name</b>	<b>Label</b>
SUPPID	Supplement ID number
SUPP	Supplement name
SOURCE	Supplement information source (Appendix 5)
FORMTYPE	Formulation type (Appendix 6)
SERVQ	Serving size quantity
SERVUNIT	Serving size unit (Appendix 10)
SERVA	Alternative serving size
CNTVIT	Count of vitamins in the supplement
CNTMIN	Count of minerals in the supplement
CNTAA	Count of amino acids in the supplement
CNTBOT	Count of botanicals in the supplement
CNTO	Count of other ingredients in the supplement

<b>File 4: Ingredient Information</b>	
<b>Variable Name</b>	<b>Label</b>
SUPPID	Supplement ID number
SUPP	Supplement name
INGID	Ingredient ID
INGR	Ingredient name
INGOPER	Ingredient operator (<,=,>)
INGQTY	Ingredient quantity
INGUNIT	Ingredient unit (Appendix 11)
INGCAT	Ingredient category (Appendices 7 and 12)
BLENDFLAG	Blend flag
VERIFIED	Date when quantities of ingredients checked

**File 5: Supplement Blend**

<b>Variable Name</b>	<b>Label</b>
INGID	Ingredient ID number
INGR	Ingredient name
BLENDID	Blend component ID
BLENDNAME	Blend component name
BLENDCAT	Blend component category



Appendix 1: Wave 3 Supplement Questionnaire

HANDLS OVER-THE-COUNTER AND PRESCRIPTION DIETARY SUPPLEMENTS QUESTIONNAIRE

SP NAME:
HH ID:
INTERVIEW:
DATE:

Interviewer: First, if you have any bottles or containers of any over the counter and prescription supplements or antacids, I would like to ask you to get them if you do not have them in front of you for this part of the interview. Do you have any questions before we begin?

Q.1 All day yesterday, between midnight and midnight, did you take any over the counter vitamin and/or mineral supplements?

Circle: YES or NO If yes, list the names
Names of OTC Supplements (at least 10 fields)

\_\_\_\_\_

Q.2 All day yesterday, between midnight and midnight, did you take any nonprescription antacids? (such as roluids, tums, or pepsid AC?)

Circle: YES or NO If yes, list the names
Name of Antacids (at least 5 fields)

Q.3 All day yesterday, between midnight and midnight, did you take any prescription vitamins and/or minerals, antacids, or receive any prescription supplement injections?

Circle: YES or NO If yes, list the prescription supplements and antacids
Name of Prescription Supplements and Antacids (at least 10 fields)

Q.4 Do you have the containers for all the OTC vitamins and minerals that you've used available in front of you? (If NO ask SP to go get the containers)

- YES..... 1
NO ..... 2
REFUSED..... 7
DON'T KNOW ..... 9

Interviewer Instructions: First I am going to ask you some questions about (INSERT NAME OF OTC SUPPLEMENT) that you took yesterday.

Q. 5 What appears on the front label of the supplement you took, please include the brand name?

Interviewer Instruction: Refer SP to handcard 1. Can you please read me all the words on the front label? Was it a special type? (silver, women's, men's, prenatal, liquid)?

Q5.1a...f. text boxes w/ unlimited space
ENTER SUPPLEMENT NAME

- REFUSED ..... 7
DON'T KNOW ..... 9

**Probe if brand name unknown**

**SINGLE ELEMENTS**

VITAMIN A.....	10
VITAMIN B6.....	12
VITAMIN B12.....	13
VITAMIN C (WITH OR WITHOUT ROSE HIPS).....	14
VITAMIN D.....	15
VITAMIN E.....	16
CALCIUM .....	18
CHROMIUM (CHROMIUM PICOLINATE) .....	19
FOLATE (FOLIC ACID) .....	20
IRON (FERROUS XXXATE).....	21
MAGNESIUM.....	27
POTASSIUM.....	28
SELENIUM .....	29
ZINC (ZINC GLUCONATE) .....	40

**MULTI ELEMENTS**

VITAMINS A & D .....	50
CALCIUM & VITAMIN D .....	51
CALCIUM & MAGNESIUM .....	52

Q.6 ENTER **MANUFACTURER/DISTRIBUTOR/STORE** BRAND NAME.

ENTER AS MUCH INFORMATION AS POSSIBLE.

Q6.1a..f \_\_\_\_\_

REFUSED..... 7

DON'T KNOW ..... 9

Q.7 ENTER **CITY** NAME. {ENTER AS MUCH INFORMATION AS POSSIBLE}

Q7.1a..f \_\_\_\_\_

REFUSED..... 7

DON'T KNOW ..... 9

Q.8 ENTER **STATE** NAME. {ENTER 2-LETTER STATE ABBREVIATION}

Q8.1a..f \_\_\_\_\_

REFUSED..... 7

DON'T KNOW ..... 9

Q.9 What is the form of the supplement taken as stated on the container? (Ex: pill, tablet, liquid etc.) Interviewer Instructions : Write in code corresponding to product name

Q9.1a...f \_\_\_\_\_

<b>Label</b>	<b>Code</b>
Caplet	1
Capsule	2
Dropper	3
Drop	4
Fluid Ounce	5
Gel Cap	6
Injection/Shot	8
Lozenge	9
Milliliter	10
Package/Packet	12
Pill	13
Tablespoon/Powder	14
Softgel	16
Tablespoon/Liquid	17
Tablet	18
Teaspoon/Liquid	19
Wafer	20
Ounce/Powder	21
Spray/Squirt	22
Scoop/Powder	24
Cup/Powder	25
Chew	27
Other	28
Vegicap	29
Can/Liquid	30
Capful	31
Gumball	32
Gram/Powder	33
Teaspoon/Powder	34
Can/Powder	35
Scoop/Liquid	36
Cup/Liquid	37
Gram/Liquid	38
Drop/Lozenge	39
Unknown Dosage Form	99

REFUSED..... 77  
 DON'T KNOW ..... 99

Q.10 What was the strength per tablet/pill/etc? Interviewer Instruction: Please if it is a double/triple element ask for the strength of each element. (Check the front label or the nutrition; if there is no information on the front label, check the nutrition facts)

Q10.1a...f \_\_\_\_\_

REFUSED..... 7  
 DON'T KNOW ..... 9

Q.11 Between midnight and midnight, how much of a dose did you take? (Ex: 2 gelcaps)

\*List number of supplements taken and then form listed below.

\*Number taken, then type. (Example: 4, 6 = means they took 4 lozenges)

Q11.1a...f \_\_\_\_\_

REFUSED..... 7

DON'T KNOW ..... 9

TABLETS/CAPSULES/PILLS/CAPLETS/  
SOFTGELS/GEL CAPS/VEGICAPS/

CHEWABLE TABLETS ..... 1

DROPPERS..... 2

DROPS ..... 3

INJECTIONS/SHOTS ..... 5

LOZENGES/COUGH DROPS ..... 6

MILLILITERS ..... 7

POWDER/GRANULES ..... 10

TABLESPOONS ..... 11

TEASPOONS ..... 12

WAFERS ..... 13

CANS..... 15

GRAMS..... 16

DOTS..... 17

CUPS..... 18

SPRAYS/SQUIRTS ..... 19

CHEWS/GUMMIES ..... 20

SCOOPS ..... 21

CC ..... 22

CAPFULS ..... 23

MG ..... 24

UNITS ..... 25

GULP ..... 26

OUNCES ..... 27

PACKAGES/PACKETS ..... 28

VIALS..... 29

GUMBALLS ..... 30

OTHER FORM (SPECIFY) ..... 91

REFUSED..... 77

DON'T KNOW ..... 99

Q.12 For how long have you been taking the supplement?  
ENTER NUMBER AND UNIT (DAYS, WEEKS, MONTHS OR YEARS)

Q12.1a...f \_\_\_\_\_

\_\_\_\_\_Days    \_\_\_\_\_Months    \_\_\_\_\_Years

Q.13 Have you taken it on a regular basis?  
YES or NO

Q.14 Did you decide to take {INSERT PRODUCT NAME} for reasons of your own or did a doctor or other health provider tell you to take it?

Q14.1a...f \_\_\_\_\_

DECIDED TO TAKE IT FOR REASONS	
OF MY OWN.....	1
A DOCTOR OR OTHER HEALTH	
PROVIDER TOLD ME TO .....	2
REFUSED.....	7
DON'T KNOW .....	9

Q.15 For what reason or reasons do you take or the doctor or other health professional tell you to take {INSERT PRODUCT NAME}? **Interviewer Instructions: Refer SP to Handcard 2**

Q151a...f \_\_\_\_\_

**CODE ALL THAT APPLY.**

- FOR GOOD BOWEL/COLON HEALTH..... 10
- FOR PROSTATE HEALTH..... 11
- FOR MENTAL HEALTH..... 12
- TO PREVENT HEALTH PROBLEMS ..... 13
- TO IMPROVE MY OVERALL HEALTH ..... 14
- FOR TEETH, PREVENT CAVITIES ..... 15
- TO SUPPLEMENT MY DIET (BECAUSE I DON'T GET ENOUGH FROM FOOD) ..... 16
- TO MAINTAIN HEALTH (TO STAY HEALTHY) ..... 17
- TO PREVENT COLDS, BOOST IMMUNE SYSTEM ..... 18
- FOR HEART HEALTH, CHOLESTEROL ..... 19
- FOR EYE HEALTH..... 20
- FOR HEALTHY JOINTS, ARTHRITIS ..... 21
- FOR SKIN HEALTH, DRY SKIN..... 22
- FOR WEIGHT LOSS ..... 23
- FOR BONE HEALTH, BUILD STRONG BONES, OSTEOPOROSIS..... 24
- TO GET MORE ENERGY..... 25
- FOR PREGNANCY..... 26
- FOR ANEMIA, SUCH AS LOW IRON..... 27
- LACTOSE INTOLERANCE..... 28
- OTHER SPECIFY ..... 91
- REFUSED..... 77
- DON'T KNOW ..... 99

Q.16 Any other over the counter supplements such as herbals (Echinacea, Ginseng, Ginkgo), fiber supplements (Metamucil, Fibercon, Benefiber), or protein or amino acids (Lysine, Methionine, Tryptophan)? Circle: YES or NO (If yes, repeat questions Q5 – Q15)

**NON-PRESCRIPTION ANTACIDS**

**Interviewer Instructions: Now I am going to be asking you a few questions about your use of nonprescription antacids.**

Q.17 Do you have the containers for **all** nonprescription antacids that you've used **yesterday** available in front of you? (If NO ask SP to go get the containers)

- YES..... 1
- NO ..... 2
- REFUSED..... 7
- DON'T KNOW ..... 9

Q. 18 All day yesterday, between midnight and midnight, did you take any **nonprescription** antacids? (such as rolaids, tums, or pepsid AC?)  
Circle: YES or NO

**Interviewer Instructions:** First I am going to ask you some questions about INSERT NAME OF ANATACID) that you took yesterday.

Q. 19 Please read me all the words on the front label.  
What appears on the front label of the antacid you took?  
Was it extra strength, regular strength, ultra, maximum?

**Interviewer Instruction:** Refer SP to Handcard 1 of antacid.

Q19.1a...f \_\_\_\_\_  
ENTER SUPPLEMENT NAME

REFUSED ..... 7  
DON'T KNOW ..... 9

Q.20 ENTER **MANUFACTURER/DISTRIBUTOR/STORE** BRAND NAME.  
  
ENTER AS MUCH INFORMATION AS POSSIBLE.

Q20.1a...f \_\_\_\_\_

REFUSED..... 7  
DON'T KNOW ..... 9

Q.21 ENTER **CITY** NAME. {ENTER AS MUCH INFORMATION AS POSSIBLE}

Q21.1a...f \_\_\_\_\_

REFUSED..... 7  
DON'T KNOW ..... 9

Q.22 ENTER **STATE** NAME. {ENTER 2-LETTER STATE ABBREVIATION}

Q22.1a...f \_\_\_\_\_

REFUSED..... 7  
DON'T KNOW ..... 9

Q.23 What was the form of the **nonprescription** antacid taken? (Ex: pill, tablet, liquid etc)

Q23.1a...f \_\_\_\_\_

<b>Label</b>	<b>Code</b>
Caplet	1
Capsule	2
Dropper	3
Drop	4
Fluid Ounce	5
Gel Cap	6
Injection/Shot	8
Lozenge	9
Milliliter	10
Package/Packet	12
Pill	13
Tablespoon/Powder	14
Softgel	16
Tablespoon/Liquid	17
Tablet	18
Teaspoon/Liquid	19
Wafer	20
Ounce/Powder	21
Spray/Squirt	22
Scoop/Powder	24
Cup/Powder	25
Chew	27
Other	28
Vegicap	29
Can/Liquid	30
Capful	31
Gumball	32
Gram/Powder	33
Teaspoon/Powder	34
Can/Powder	35
Scoop/Liquid	36
Cup/Liquid	37
Gram/Liquid	38
Drop/Lozenge	39
Unknown Dosage Form	99
REFUSED .....	77
DON'T KNOW .....	99

Q.24 What was the strength per antacid tablet/pill/etc?

Q24.1a...f \_\_\_\_\_

REFUSED.....	7
DON'T KNOW .....	9



Q.25 Between midnight and midnight, how much of a dose did you take? (Ex: 2 gelcaps)

\*List number of antacids taken and then form listed below.

\*Number taken, then type. (Example: 4, 6 = means they took 4 lozenges)

Q25.1a...f \_\_\_\_\_

REFUSED..... 7  
DON'T KNOW ..... 9

TABLETS/CAPSULES/PILLS/CAPLETS/  
SOFTGELS/GEL CAPS/VEGICAPS/  
CHEWABLE TABLETS ..... 1  
DROPPERS..... 2  
DROPS ..... 3  
INJECTIONS/SHOTS ..... 5  
LOZENGES/COUGH DROPS ..... 6  
MILLILITERS ..... 7  
POWDER/GRANULES ..... 10  
TABLESPOONS ..... 11  
TEASPOONS ..... 12  
WAFERS ..... 13  
CANS..... 15  
GRAMS..... 16  
DOTS..... 17  
CUPS..... 18  
SPRAYS/SQUIRTS ..... 19  
CHEWS/GUMMIES ..... 20  
SCOOPS ..... 21  
CC ..... 22  
CAPFULS ..... 23  
MG ..... 24  
UNITS ..... 25  
GULP ..... 26  
OUNCES ..... 27  
PACKAGES/PACKETS ..... 28  
VIALS..... 29  
GUMBALLS ..... 30  
OTHER FORM (SPECIFY) ..... 91  
REFUSED..... 77  
DON'T KNOW ..... 99

Q.26 For how long have you been taking the supplement?  
ENTER NUMBER AND UNIT (OF DAYS, WEEKS, MONTHS OR YEARS)

Q26.1a...f \_\_\_\_\_  
\_\_\_\_\_ Days      \_\_\_\_\_ Months      \_\_\_\_\_ Years

Q.27 Have you taken it on a regular basis?  
YES or NO

Q.28 Did you decide to take {INSERT PRODUCT NAME} for reasons of your own or did a doctor or other health provider tell you to take it?

Q28.1a...f \_\_\_\_\_

DECIDED TO TAKE IT FOR REASONS  
OF MY OWN..... 1  
A DOCTOR OR OTHER HEALTH  
PROVIDER TOLD ME TO ..... 2  
REFUSED..... 7  
DON'T KNOW ..... 9

Q.29 For what reason or reasons do you take or the doctor or other health professional tell you to take {PRODUCT}?  
 Interviewer Instructions: Refer SP to Handcard 2

Q29.1a...f \_\_\_\_\_

**CODE ALL THAT APPLY.**

- FOR GOOD BOWEL/COLON HEALTH..... 10
- FOR PROSTATE HEALTH..... 11
- FOR MENTAL HEALTH..... 12
- TO PREVENT HEALTH PROBLEMS ..... 13
- TO IMPROVE MY OVERALL HEALTH ..... 14
- FOR TEETH, PREVENT CAVITIES ..... 15
- TO SUPPLEMENT MY DIET (BECAUSE  
 I DON'T GET ENOUGH FROM FOOD) ..... 16
- TO MAINTAIN HEALTH (TO STAY  
 HEALTHY) ..... 17
- TO PREVENT COLDS, BOOST IMMUNE  
 SYSTEM ..... 18
- FOR HEART HEALTH, CHOLESTEROL ..... 19
- FOR EYE HEALTH..... 20
- FOR HEALTHY JOINTS, ARTHRITIS ..... 21
- FOR SKIN HEALTH, DRY SKIN..... 22
- FOR WEIGHT LOSS ..... 23
- FOR BONE HEALTH, BUILD STRONG  
 BONES, OSTEOPOROSIS..... 24
- TO GET MORE ENERGY..... 25
- FOR PREGNANCY..... 26
- FOR ANEMIA, SUCH AS LOW IRON..... 27
- LACTOSE INTOLERANCE..... 28
- OTHER SPECIFY ..... 91
- REFUSED..... 77
- DON'T KNOW ..... 99

Q.30 Any other antacids (such as rolaids, tums, or pepsid AC)? Circle YES or No (If yes repeat Q17 – Q29) **If no, proceed to Q31.**

**PRESCRIPTION VITAMINS, MINERALS AND ANTACIDS**

**Interviewer Instruction:** Now I am going to be asking you a few questions about your use of **prescription** vitamins, and/or minerals, antacids, and supplement injections.

Q.31 Do you have the containers for **all** the prescription supplements that you've used **yesterday** available in front of you?

(If NO ask SP to go get the containers)

- YES..... 1
- NO ..... 2
- REFUSED..... 7
- DON'T KNOW ..... 9

Q.32 All day yesterday, between midnight and midnight, did you take any **prescription** vitamins, minerals, antacids, or receive any prescription supplement injections?  
 Circle: YES or NO

**Interviewer Instructions:** First I am going to ask you some questions about INSERT NAME OF PRESCRIPTION) that you took yesterday.

Q. 33 What appears on the front label of the prescription supplement or antacid you took?  
Can you please read me all the words on the front label, if available?

Q33.1a...f \_\_\_\_\_  
ENTER SUPPLEMENT NAME

REFUSED..... 7  
DON'T KNOW..... 9

Q.34 ENTER **MANUFACTURER/DISTRIBUTOR/STORE** BRAND NAME.  
  
ENTER AS MUCH INFORMATION AS POSSIBLE.

Q34.1a...f \_\_\_\_\_

REFUSED..... 7  
DON'T KNOW..... 9

Q.35 What was the form of the supplement taken? (Ex: pill, tablet, liquid etc.)

Q35.1a...f \_\_\_\_\_

<b>Label</b>	<b>Code</b>
Caplet	1
Capsule	2
Dropper	3
Drop	4
Fluid Ounce	5
Gel Cap	6
Injection/Shot	8
Lozenge	9
Milliliter	10
Package/Packet	12
Pill	13
Tablespoon/Powder	14
Softgel	16
Tablespoon/Liquid	17
Tablet	18
Teaspoon/Liquid	19
Wafer	20
Ounce/Powder	21
Spray/Squirt	22
Scoop/Powder	24
Cup/Powder	25
Chew	27
Other	28
Vegicap	29
Can/Liquid	30
Capful	31
Gumball	32
Gram/Powder	33

Teaspoon/Powder	34
Can/Powder	35
Scoop/Liquid	36
Cup/Liquid	37
Gram/Liquid	38
Drop/Lozenge	39
Unknown Dosage Form	99

REFUSED .....	77
DON'T KNOW .....	99

Q.36 What was the strength per **prescription** tablet/pill/etc? Please if it is a double/triple element ask for the strength of each element.

Q36.1a...f \_\_\_\_\_

REFUSED.....	7
DON'T KNOW .....	9

Q.37 Between midnight and midnight, how much of a dose did you take? (Ex: 2 gelcaps)

\*List number of **prescription** supplements taken and then form listed below.

\*Number taken, then type. (Example: 4, 6 = means they took 4 lozenges)

Q37.1a...f \_\_\_\_\_

REFUSED.....	7
DON'T KNOW .....	9

TABLETS/CAPSULES/PILLS/CAPLETS/ SOFTGELS/GEL CAPS/VEGICAPS/ CHEWABLE TABLETS .....	1
DROPPERS.....	2
DROPS .....	3
INJECTIONS/SHOTS .....	5
LOZENGES/COUGH DROPS .....	6
MILLILITERS .....	7
POWDER/GRANULES .....	10
TABLESPOONS .....	11
TEASPOONS .....	12
WAFERS .....	13
CANS.....	15
GRAMS.....	16
DOTS.....	17
CUPS.....	18
SPRAYS/SQUIRTS .....	19
CHEWS/GUMMIES .....	20
SCOOPS .....	21
CC .....	22
CAPFULS .....	23
MG.....	24
UNITS.....	25
GULP.....	26
OUNCES .....	27
PACKAGES/PACKETS .....	28
VIALS.....	29
GUMBALLS .....	30
OTHER FORM (SPECIFY).....	91
REFUSED.....	77
DON'T KNOW.....	99

Q.38 How long have you been taking the prescription supplement/antacid?  
ENTER NUMBER AND UNIT (DAYS, WEEKS, MONTHS OR YEARS)

Q38.1a...f \_\_\_\_\_

\_\_\_\_\_ Days      \_\_\_\_\_ Months      \_\_\_\_\_ Years

Q. 39 Have you taken it on a regular basis?  
YES or NO

Q.40 Did you decide to take {INSERT PRODUCT NAME} for reasons of your own or did a doctor or other health provider tell you to take it?

Q40.1a...f \_\_\_\_\_

DECIDED TO TAKE IT FOR REASONS OF MY OWN.....	1
A DOCTOR OR OTHER HEALTH PROVIDER TOLD ME TO .....	2
REFUSED.....	7
DON'T KNOW.....	9

Q.41 For what reason or reasons do you take or the doctor or other health professional tell you to take {PRODUCT}?  
Interviewer Instruction: Refer SP to Hand card 2.

Q41.1a...f \_\_\_\_\_

### CODE ALL THAT APPLY.

FOR GOOD BOWEL/COLON HEALTH.....	10
FOR PROSTATE HEALTH.....	11
FOR MENTAL HEALTH.....	12
TO PREVENT HEALTH PROBLEMS .....	13
TO IMPROVE MY OVERALL HEALTH .....	14
FOR TEETH, PREVENT CAVITIES .....	15
TO SUPPLEMENT MY DIET (BECAUSE I DON'T GET ENOUGH FROM FOOD) .....	16
TO MAINTAIN HEALTH (TO STAY HEALTHY) .....	17
TO PREVENT COLDS, BOOST IMMUNE SYSTEM .....	18
FOR HEART HEALTH, CHOLESTEROL .....	19
FOR EYE HEALTH.....	20
FOR HEALTHY JOINTS, ARTHRITIS .....	21
FOR SKIN HEALTH, DRY SKIN.....	22
FOR WEIGHT LOSS .....	23
FOR BONE HEALTH, BUILD STRONG BONES, OSTEOPOROSIS.....	24
TO GET MORE ENERGY.....	25
FOR PREGNANCY.....	26
FOR ANEMIA, SUCH AS LOW IRON.....	27
LACTOSE INTOLERANCE.....	28
OTHER SPECIFY .....	91
REFUSED.....	77
DON'T KNOW .....	99

Q.42 Any other **prescription** supplements or antacids? Circle Yes or No (If yes repeat Q31-41)

When list is complete review total number of dietary supplements and antacids and their names with respondent, then proceed to Q43

Q. 43 Who was the main respondent for this interview?

Sample person	1
Mother of sample person	2
Father of sample person	3
Wife of sample person	4
Husband of sample person	5
Daughter of SP	6
Son of SP	7
Friend, partner, non relative	8
Care provider or caretaker	9
Other relative	10
Other, specify	11

Q.44 Who else helped in responding for this interview?

Yes	1
No	2

If yes,

Sample person	1
Mother of sample person	2
Father of sample person	3
Wife of sample person	4
Husband of sample person	5
Daughter of SP	6
Son of SP	7
Grandchild of SP	8
Friend, partner, non relative	9
Care provider or caretaker	10
Other relative	11
Other, specify	12

Q. 45 Did you or the respondent have difficulty or any comments about this supplement interview?

Yes	1	
No	2	<i>If no....questionnaire ends</i>

If yes....What were the reasons for this difficulty or comments about this interview?

Did not understand questions	1
Not familiar with handcards	2
Did not have handcards	3
Poor memory of supplements taken	4
Sick	5
Hearing impairment	6
Telephone connection problems	7
Interruptions	8
Uncooperative/impatient	9
Distracted/uninterested	10
Supplement list may be incomplete (explain in remark box)	11
Unreliable (explain in remark box)	12
Not ascertained	13
Other specify (explain in remark box)	14



**Appendix 2: Wave 4 Supplement Questionnaire**

**HANDLS OVER-THE-COUNTER AND PRESCRIPTION DIETARY SUPPLEMENTS QUESTIONNAIRE**

**SP NAME:**  
**HH ID:**  
**INTERVIEW:**  
**DATE:**

**Interviewer:** First, if you have any bottles or containers of any over the counter and prescription supplements or antacids, I would like to ask you to get them if you do not have them in front of you for this part of the interview. Do you have any questions before we begin?

**Q.1** Do you take any over the counter vitamin and/or mineral supplements?

Circle: YES or NO If yes, list the names  
 Names of OTC Supplements (at least 10 fields)

\_\_\_\_\_

**Q.2** Do you take any **nonprescription** antacids? (such as rolaids, tums, or pepsid AC?)

Circle: YES or NO If yes, list the names  
 Name of Antacids (at least 5 fields)

**Q.3** Do you take any **prescription** vitamins and/or minerals, antacids, or receive any prescription supplement injections?

Circle: YES or NO If yes, list the prescription supplements and antacids  
 Name of Prescription Supplements and Antacids (at least 10 fields)

**Q.4** Do you take any other over the counter supplements such as herbals (Echinacea, Ginseng, Ginkgo), fiber supplements (Metamucil, Fibercon, Benefiber), or protein or amino acids (Lysine, Methionine, Tryptophan)?

Circle: YES or NO If yes, list the prescription supplements and antacids  
 Name of Prescription Supplements and Antacids (at least 10 fields)

**Q.5** Do you have the containers for **all** the OTC vitamins and minerals that you've used available in front of you?  
 (If NO ask SP to go get the containers)

- YES..... 1
- NO ..... 2
- REFUSED..... 7
- DON'T KNOW ..... 9

**Interviewer Instructions:** First I am going to ask you some questions about (INSERT NAME OF OTC SUPPLEMENT) that you took yesterday.

**Q. 6** What appears on the front label of the supplement you took, please include the brand name?

**Interviewer Instruction:** Can you please read me all the words on the front label? Was it a special type? (silver, women's, men's, prenatal, liquid)?

Q6.1a...f \_\_\_\_\_

ENTER SUPPLEMENT NAME

REFUSED .....	7
DON'T KNOW .....	9

**Probe if brand name unknown**

**SINGLE ELEMENTS**

VITAMIN A.....	10
VITAMIN B6.....	12
VITAMIN B12.....	13
VITAMIN C (WITH OR WITHOUT ROSE HIPS).....	14
VITAMIN D.....	15
VITAMIN E.....	16
CALCIUM .....	18
CHROMIUM (CHROMIUM PICOLINATE) .....	19
FOLATE (FOLIC ACID) .....	20
IRON (FERROUS XXXATE).....	21
MAGNESIUM.....	27
POTASSIUM.....	28
SELENIUM .....	29
ZINC (ZINC GLUCONATE) .....	40

**MULTI ELEMENTS**

VITAMINS A & D .....	50
CALCIUM & VITAMIN D .....	51
CALCIUM & MAGNESIUM .....	52

**Q.7 ENTER MANUFACTURER/DISTRIBUTOR/STORE BRAND NAME.**

ENTER AS MUCH INFORMATION AS POSSIBLE.

Q7.1a...f \_\_\_\_\_

REFUSED.....	7
DON'T KNOW .....	9

**Q.8 ENTER CITY NAME. {ENTER AS MUCH INFORMATION AS POSSIBLE}**

Q8.1a...f \_\_\_\_\_

REFUSED.....	7
DON'T KNOW .....	9

**Q.8a** ENTER **STATE** NAME. {ENTER 2-LETTER STATE ABBREVIATION}

Q8a.1a...f \_\_\_\_\_

REFUSED..... 7  
DON'T KNOW ..... 9

**Q.9** What is the form of the supplement taken as stated on the container? (Ex: pill, tablet, liquid etc.) **Interviewer Instructions : Write in code corresponding to product name**

Q9.1a...f \_\_\_\_\_

<b>Label</b>	<b>Code</b>
Caplet	1
Capsule	2
Dropper	3
Drop	4
Fluid Ounce	5
Gel Cap	6
Injection/Shot	8
Lozenge	9
Milliliter	10
Package/Packet	12
Pill	13
Tablespoon/Powder	14
Softgel	16
Tablespoon/Liquid	17
Tablet	18
Teaspoon/Liquid	19
Wafer	20
Ounce/Powder	21
Spray/Squirt	22
Scoop/Powder	24
Cup/Powder	25
Chew	27
Other	28
Vegicap	29
Can/Liquid	30
Capful	31
Gumball	32
Gram/Powder	33
Teaspoon/Powder	34
Can/Powder	35
Scoop/Liquid	36
Cup/Liquid	37
Gram/Liquid	38
Drop/Lozenge	39
Unknown Dosage Form	99

REFUSED..... 77  
DON'T KNOW ..... 99

**Q.10** What was the strength per tablet/pill/etc? Interviewer Instruction: Please if it is a double/triple element ask for the strength of each element. (Check the front label or the nutrition; if there is no information on the front label, check the nutrition facts)

Q10.1a...f \_\_\_\_\_

REFUSED..... 7  
 DON'T KNOW ..... 9

**Q.11** Between midnight and midnight, how much of a dose did you take? (Ex: 2 gelcaps)

\*List number of supplements taken and then form listed below.

\*Number taken, then type. (Example: 4, 6 = means they took 4 lozenges)

Q11.1a...f \_\_\_\_\_

REFUSED..... 7  
 DON'T KNOW ..... 9

TABLETS/CAPSULES/PILLS/CAPLETS/  
 SOFTGELS/GEL CAPS/VEGICAPS/  
 CHEWABLE TABLETS ..... 1  
 DROPPERS..... 2  
 DROPS ..... 3  
 INJECTIONS/SHOTS ..... 5  
 LOZENGES/COUGH DROPS ..... 6  
 MILLILITERS ..... 7  
 POWDER/GRANULES ..... 10  
 TABLESPOONS ..... 11  
 TEASPOONS ..... 12  
 WAFERS ..... 13  
 CANS ..... 15  
 GRAMS..... 16  
 DOTS ..... 17  
 CUPS ..... 18  
 SPRAYS/SQUIRTS ..... 19  
 CHEWS/GUMMIES ..... 20  
 SCOOPS ..... 21  
 CC ..... 22  
 CAPFULS ..... 23  
 MG ..... 24  
 UNITS ..... 25  
 GULP ..... 26  
 OUNCES ..... 27  
 PACKAGES/PACKETS ..... 28  
 VIALS..... 29  
 GUMBALLS ..... 30  
 OTHER FORM (SPECIFY) ..... 91  
 REFUSED..... 77  
 DON'T KNOW ..... 99

**Q.11A.** What is your usual dosage? (Ex: 2 gencaps)

\*List number of supplements taken and then form listed below.

\*Number taken, then type. (Example: 4, 6 = means they took 4 lozenges)

Q11A.1a...f \_\_\_\_\_

REFUSED..... 7  
DON'T KNOW ..... 9

TABLETS/CAPSULES/PILLS/CAPLETS/  
SOFTGELS/GEL CAPS/VEGICAPS/  
CHEWABLE TABLETS ..... 1  
DROPPERS..... 2  
DROPS..... 3  
INJECTIONS/SHOTS ..... 5  
LOZENGES/COUGH DROPS ..... 6  
MILLILITERS ..... 7  
POWDER/GRANULES ..... 10  
TABLESPOONS ..... 11  
TEASPOONS ..... 12  
WAFERS ..... 13  
CANS..... 15  
GRAMS..... 16  
DOTS..... 17  
CUPS..... 18  
SPRAYS/SQUIRTS ..... 19  
CHEWS/GUMMIES ..... 20  
SCOOPS ..... 21  
CC ..... 22  
CAPFULS ..... 23  
MG..... 24  
UNITS ..... 25  
GULP ..... 26  
OUNCES ..... 27  
PACKAGES/PACKETS ..... 28  
VIALS..... 29  
GUMBALLS ..... 30  
OTHER FORM (SPECIFY) ..... 91  
REFUSED..... 77  
DON'T KNOW            99

**Q.12** Did you take it yesterday?  
YES or NO

**Q.13** For how long have you been taking the supplement?  
ENTER NUMBER AND UNIT (DAYS, WEEKS, MONTHS OR YEARS)

Q12.1a(Ex. 3 years)...f \_\_\_\_\_

\_\_\_\_\_Days    \_\_\_\_\_Months    \_\_\_\_\_Years

- DAYS ..... 1
- WEEKS..... 2
- MONTHS ..... 3
- YEARS..... 4
- OTHER ..... 5

**Q.13A** Do you take it daily?  
YES or NO

**Q. 13B** If NO (not daily), how often?  
ENTER NUMBER AND UNIT (DAYS, WEEKS, MONTHS, or YEARS) (EX.)

Q13B.1a (EX. 2 days per week)...f \_\_\_\_\_

**Q.14** Did you decide to take {INSERT PRODUCT NAME} for reasons of your own or did a doctor or other health provider tell you to take it?

Q14.1a...f \_\_\_\_\_

- DECIDED TO TAKE IT FOR REASONS  
OF MY OWN..... 1
- A DOCTOR OR OTHER HEALTH  
PROVIDER TOLD ME TO ..... 2
- REFUSED..... 7
- DON'T KNOW ..... 9

**Q.15** For what reason or reasons do you take or the doctor or other health professional tell you to take {INSERT PRODUCT NAME}?

Q151a...f \_\_\_\_\_

**CODE ALL THAT APPLY.**

- FOR GOOD BOWEL/COLON HEALTH..... 10
- FOR PROSTATE HEALTH..... 11
- FOR MENTAL HEALTH..... 12
- TO PREVENT HEALTH PROBLEMS ..... 13
- TO IMPROVE MY OVERALL HEALTH ..... 14
- FOR TEETH, PREVENT CAVITIES ..... 15
- TO SUPPLEMENT MY DIET (BECAUSE I DON'T GET ENOUGH FROM FOOD) ..... 16
- TO MAINTAIN HEALTH (TO STAY HEALTHY) ..... 17
- TO PREVENT COLDS, BOOST IMMUNE SYSTEM ..... 18
- FOR HEART HEALTH, CHOLESTEROL ..... 19
- FOR EYE HEALTH..... 20
- FOR HEALTHY JOINTS, ARTHRITIS ..... 21
- FOR SKIN HEALTH, DRY SKIN..... 22
- FOR WEIGHT LOSS ..... 23
- FOR BONE HEALTH, BUILD STRONG BONES, OSTEOPOROSIS..... 24
- TO GET MORE ENERGY..... 25
- FOR PREGNANCY..... 26
- FOR ANEMIA, SUCH AS LOW IRON..... 27
- LACTOSE INTOLERANCE..... 28
- OTHER SPECIFY ..... 91
- REFUSED..... 77
- DON'T KNOW ..... 99

**Q.16** Any other over the counter over the counter supplements such as herbals (Echinacea, Ginseng, Ginkgo), fiber supplements (Metamucil, Fibercon, Benefiber), or protein or amino acids (Lysine, Methionine, Tryptophan)? Circle: YES or NO (If yes, repeat questions Q5 – Q15)

**NON-PRESCRIPTION ANTACIDS**

**Interviewer Instructions:** Now I am going to be asking you a few questions about your use of nonprescription antacids.

**Q.17** Do you have the containers for **all** nonprescription antacids that you've used **yesterday** available in front of you? (If NO ask SP to go get the containers)

- YES..... 1
- NO ..... 2
- REFUSED..... 7
- DON'T KNOW ..... 9

**Interviewer Instructions:** First I am going to ask you some questions about (INSERT NAME OF ANATACID) that you took yesterday.

**Q. 18** What appears on the front label of the antacid you took?  
Please read me all the words on the front label.  
Was it extra strength, regular strength, ultra, maximum?

Q19.1a...f. \_\_\_\_\_  
ENTER SUPPLEMENT NAME

REFUSED ..... 7  
DON'T KNOW ..... 9

**Q.19** ENTER **MANUFACTURER/DISTRIBUTOR/STORE** BRAND NAME.

ENTER AS MUCH INFORMATION AS POSSIBLE.

Q20.1a...f \_\_\_\_\_

REFUSED..... 7  
DON'T KNOW ..... 9

**Q.20** ENTER **CITY** NAME. {ENTER AS MUCH INFORMATION AS POSSIBLE}

Q21.1a...f \_\_\_\_\_

REFUSED..... 7  
DON'T KNOW ..... 9

**Q.21** ENTER **STATE** NAME. {ENTER 2-LETTER STATE ABBREVIATION}

Q22.1a...f \_\_\_\_\_

REFUSED..... 7  
DON'T KNOW ..... 9

**Q.22** What was the form of the **nonprescription** antacid taken? (Ex: pill, tablet, liquid etc)

Q23.1a...f \_\_\_\_\_

<b>Label</b>	<b>Code</b>
Caplet	1
Capsule	2
Dropper	3
Drop	4



Fluid Ounce	5
Gel Cap	6
Injection/Shot	8
Lozenge	9
Milliliter	10
Package/Package	12
Pill	13
Tablespoon/Powder	14
Softgel	16
Tablespoon/Liquid	17
Tablet	18
Teaspoon/Liquid	19
Wafer	20
Ounce/Powder	21
Spray/Squirt	22
Scoop/Powder	24
Cup/Powder	25
Chew	27
Other	28
Vegicap	29
Can/Liquid	30
Capful	31
Gumball	32
Gram/Powder	33
Teaspoon/Powder	34
Can/Powder	35
Scoop/Liquid	36
Cup/Liquid	37
Gram/Liquid	38
Drop/Lozenge	39
Unknown Dosage Form	99

REFUSED .....	77
DON'T KNOW .....	99

**Q.23** What was the strength per antacid tablet/pill/etc?

Q23.1a...f \_\_\_\_\_

REFUSED.....	7
DON'T KNOW .....	9

**Q.24** Between midnight and midnight, how much of a dose did you take? (Ex: 2 gelcaps)

\*List number of antacids taken and then form listed below.

\*Number taken, then type. (Example: 4, 6 = means they took 4 lozenges)

Q24.1a...f \_\_\_\_\_

REFUSED.....	7
DON'T KNOW .....	9

TABLETS/CAPSULES/PILLS/CAPLETS/ SOFTGELS/GEL CAPS/VEGICAPS/ CHEWABLE TABLETS .....	1
DROPPERS.....	2
DROPS .....	3
INJECTIONS/SHOTS .....	5
LOZENGES/COUGH DROPS .....	6
MILLILITERS .....	7
POWDER/GRANULES .....	10
TABLESPOONS .....	11
TEASPOONS .....	12
WAFERS .....	13
CANS.....	15
GRAMS.....	16
DOTS.....	17
CUPS.....	18
SPRAYS/SQUIRTS .....	19
CHEWS/GUMMIES .....	20
SCOOPS .....	21
CC .....	22
CAPFULS .....	23
MG.....	24
UNITS.....	25
GULP.....	26
OUNCES .....	27
PACKAGES/PACKETS .....	28
VIALS.....	29
GUMBALLS .....	30
OTHER FORM (SPECIFY).....	91
REFUSED.....	77
DON'T KNOW.....	99

**Q.24A.** What is your usual dosage? (Ex: 2 gelcaps)

\*List number of supplements taken and then form listed below.

\*Number taken, then type. (Example: 4, 6 = means they took 4 lozenges)

Q.24A.1a...f \_\_\_\_\_

REFUSED.....	7
DON'T KNOW.....	9

TABLETS/CAPSULES/PILLS/CAPLETS/ SOFTGELS/GEL CAPS/VEGICAPS/ CHEWABLE TABLETS .....	1
DROPPERS.....	2
DROPS .....	3
INJECTIONS/SHOTS .....	5
LOZENGES/COUGH DROPS .....	6
MILLILITERS .....	7
POWDER/GRANULES .....	10
TABLESPOONS .....	11
TEASPOONS .....	12
WAFERS .....	13
CANS.....	15
GRAMS.....	16
DOTS.....	17
CUPS.....	18
SPRAYS/SQUIRTS .....	19
CHEWS/GUMMIES .....	20
SCOOPS .....	21
CC .....	22
CAPFULS .....	23
MG.....	24
UNITS .....	25
GULP .....	26
OUNCES .....	27
PACKAGES/PACKETS .....	28
VIALS.....	29
GUMBALLS .....	30
OTHER FORM (SPECIFY).....	91
REFUSED.....	77
DON'T KNOW .....	99

**Q.25** Did you take it yesterday?  
YES or NO

**Q.26** For how long have you been taking the antacid?  
ENTER NUMBER AND UNIT (DAYS, WEEKS, MONTHS OR YEARS)

Q26.1a(Ex. 3 years) ...f \_\_\_\_\_

\_\_\_\_\_Days      \_\_\_\_\_Months      \_\_\_\_\_Years

- DAYS ..... 1
- WEEKS..... 2
- MONTHS ..... 3
- YEARS..... 4
- OTHER ..... 5

**Q.26A** Do you take it daily?  
YES or NO

**Q.26B** If NO (not daily), how often?  
ENTER NUMBER AND UNIT (DAYS, WEEKS, MONTHS, or YEARS)

Q26B.1a (EX. 2 days per week)...f \_\_\_\_\_

**Q.27** Did you decide to take {INSERT PRODUCT NAME} for reasons of your own or did a doctor or other health provider tell you to take it?

Q27.1a...f \_\_\_\_\_

- DECIDED TO TAKE IT FOR REASONS  
OF MY OWN..... 1
- A DOCTOR OR OTHER HEALTH  
PROVIDER TOLD ME TO ..... 2
- REFUSED..... 7
- DON'T KNOW ..... 9

**Q.28** For what reason or reasons do you take or the doctor or other health professional tell you to take {PRODUCT}?

Q28.1a...f \_\_\_\_\_

## CODE ALL THAT APPLY.

FOR GOOD BOWEL/COLON HEALTH.....	10
FOR PROSTATE HEALTH.....	11
FOR MENTAL HEALTH.....	12
TO PREVENT HEALTH PROBLEMS .....	13
TO IMPROVE MY OVERALL HEALTH .....	14
FOR TEETH, PREVENT CAVITIES .....	15
TO SUPPLEMENT MY DIET (BECAUSE I DON'T GET ENOUGH FROM FOOD) .....	16
TO MAINTAIN HEALTH (TO STAY HEALTHY) .....	17
TO PREVENT COLDS, BOOST IMMUNE SYSTEM .....	18
FOR HEART HEALTH, CHOLESTEROL .....	19
FOR EYE HEALTH.....	20
FOR HEALTHY JOINTS, ARTHRITIS .....	21
FOR SKIN HEALTH, DRY SKIN.....	22
FOR WEIGHT LOSS .....	23
FOR BONE HEALTH, BUILD STRONG BONES, OSTEOPOROSIS.....	24
TO GET MORE ENERGY.....	25
FOR PREGNANCY.....	26
FOR ANEMIA, SUCH AS LOW IRON.....	27
LACTOSE INTOLERANCE.....	28
OTHER SPECIFY .....	91
REFUSED.....	77
DON'T KNOW .....	99

**Q.29** Any other antacids (such as rolaids, tums, or pepsid AC)? Circle YES or No (If yes repeat Q17 – Q29) **If no, proceed to Q30.**

### PRESCRIPTION VITAMINS, MINERALS AND ANTACIDS

**Interviewer Instruction:** Now I am going to be asking you a few questions about your use of **prescription** vitamins, and/or minerals, antacids, and supplement injections.

**Q.30** Do you have the containers for **all** the prescription supplements that you've used **yesterday** available in front of you?

(If NO ask SP to go get the containers)

YES.....	1
NO .....	2
REFUSED.....	7
DON'T KNOW .....	9

**Q.31** All day yesterday, between midnight and midnight, did you take any **prescription** vitamins, minerals, antacids, or receive any prescription supplement injections?

Circle: YES or NO

**Interviewer Instructions:** First I am going to ask you some questions about INSERT NAME OF PRESCRIPTION) that you took yesterday.

**Q. 32** What appears on the front label of the prescription supplement or antacid you took?  
Can you please read me all the words on the front label, if available?

Q32.1a...f \_\_\_\_\_  
ENTER SUPPLEMENT NAME

REFUSED..... 7  
DON'T KNOW ..... 9

**Q.33** ENTER MANUFACTURER/DISTRIBUTOR/STORE BRAND NAME.

ENTER AS MUCH INFORMATION AS POSSIBLE.

Q33.1a...f \_\_\_\_\_

REFUSED..... 7  
DON'T KNOW ..... 9

**Q.34** What was the form of the supplement taken? (Ex: pill, tablet, liquid etc.)

.....

Q34.1a...f \_\_\_\_\_

<b>Label</b>	<b>Code</b>
Caplet	1
Capsule	2
Dropper	3
Drop	4
Fluid Ounce	5
Gel Cap	6
Injection/Shot	8
Lozenge	9
Milliliter	10
Package/Packet	12
Pill	13
Tablespoon/Powder	14
Softgel	16
Tablespoon/Liquid	17
Tablet	18
Teaspoon/Liquid	19
Wafer	20
Ounce/Powder	21
Spray/Squirt	22
Scoop/Powder	24
Cup/Powder	25
Chew	27
Other	28

Vegicap	29
Can/Liquid	30
Capful	31
Gumball	32
Gram/Powder	33
Teaspoon/Powder	34
Can/Powder	35
Scoop/Liquid	36
Cup/Liquid	37
Gram/Liquid	38
Drop/Lozenge	39
Unknown Dosage Form	99

REFUSED .....	77
DON'T KNOW .....	99

**Q.35** What was the strength per **prescription** tablet/pill/etc? Please if it is a double/triple element ask for the strength of each element.

Q35.1a...f \_\_\_\_\_

REFUSED.....	7
DON'T KNOW .....	9

**Q.36** Between midnight and midnight, how much of a dose did you take? (Ex: 2 gelcaps)

\*List number of **prescription** supplements taken and then form listed below.

\*Number taken, then type. (Example: 4, 6 = means they took 4 lozenges)

Q36.1a...f \_\_\_\_\_

REFUSED.....	7
DON'T KNOW .....	9

TABLETS/CAPSULES/PILLS/CAPLETS/ SOFTGELS/GEL CAPS/VEGICAPS/ CHEWABLE TABLETS .....	1
DROPPERS.....	2
DROPS .....	3
INJECTIONS/SHOTS .....	5
LOZENGES/COUGH DROPS .....	6
MILLILITERS .....	7
POWDER/GRANULES .....	10
TABLESPOONS .....	11
TEASPOONS .....	12
WAFERS .....	13
CANS.....	15
GRAMS.....	16
DOTS.....	17
CUPS.....	18
SPRAYS/SQUIRTS .....	19
CHEWS/GUMMIES .....	20
SCOOPS .....	21
CC .....	22
CAPFULS .....	23
MG.....	24
UNITS .....	25
GULP .....	26
OUNCES .....	27
PACKAGES/PACKETS .....	28
VIALS.....	29
GUMBALLS .....	30
OTHER FORM (SPECIFY).....	91
REFUSED.....	77
DON'T KNOW.....	99



**Q.37** How long have you been taking the prescription supplement/antacid?  
 ENTER NUMBER AND UNIT (DAYS, WEEKS, MONTHS OR YEARS)

Q37.1a...f \_\_\_\_\_

\_\_\_\_\_ Days      \_\_\_\_\_ Months      \_\_\_\_\_ Years

- DAYS ..... 1
- WEEKS..... 2
- MONTHS ..... 3
- YEARS..... 4
- OTHER ..... 5

**Q.38A** Do you take it daily?  
 YES or NO

**Q.38B** If NO (not daily), how often?  
 ENTER NUMBER AND UNIT (DAYS, WEEKS, MONTHS, or YEARS)

Q38B.1a (EX. 2 days per week)...f \_\_\_\_\_

**Q.39** Did you decide to take {INSERT PRODUCT NAME} for reasons of your own or did a doctor or other health provider tell you to take it?

Q39.1a...f \_\_\_\_\_

- DECIDED TO TAKE IT FOR REASONS
- OF MY OWN..... 1
- A DOCTOR OR OTHER HEALTH
- PROVIDER TOLD ME TO ..... 2
- REFUSED..... 7
- DON'T KNOW ..... 9

**Q.40** For what reason or reasons do you take or the doctor or other health professional tell you to take {PRODUCT}?

Q40.1a...f \_\_\_\_\_

### CODE ALL THAT APPLY.

FOR GOOD BOWEL/COLON HEALTH.....	10
FOR PROSTATE HEALTH.....	11
FOR MENTAL HEALTH.....	12
TO PREVENT HEALTH PROBLEMS .....	13
TO IMPROVE MY OVERALL HEALTH .....	14
FOR TEETH, PREVENT CAVITIES .....	15
TO SUPPLEMENT MY DIET (BECAUSE I DON'T GET ENOUGH FROM FOOD) .....	16
TO MAINTAIN HEALTH (TO STAY HEALTHY) .....	17
TO PREVENT COLDS, BOOST IMMUNE SYSTEM .....	18
FOR HEART HEALTH, CHOLESTEROL .....	19
FOR EYE HEALTH.....	20
FOR HEALTHY JOINTS, ARTHRITIS .....	21
FOR SKIN HEALTH, DRY SKIN.....	22
FOR WEIGHT LOSS .....	23
FOR BONE HEALTH, BUILD STRONG BONES, OSTEOPOROSIS.....	24
TO GET MORE ENERGY.....	25
FOR PREGNANCY.....	26
FOR ANEMIA, SUCH AS LOW IRON.....	27
LACTOSE INTOLERANCE.....	28
OTHER SPECIFY .....	91
REFUSED.....	77
DON'T KNOW .....	99

**Q.41** Any other **prescription** supplements or antacids? Circle Yes or No (If yes repeat Q31-41)

When list is complete review total number of dietary supplements and antacids and their names with respondent, then proceed to Q42

**Q. 42** Who was the main respondent for this interview?

Sample person	1
Mother of sample person	2
Father of sample person	3
Wife of sample person	4
Husband of sample person	5
Daughter of SP	6
Son of SP	7
Friend, partner, non relative	8
Care provider or caretaker	9
Other relative	10
Other, specify	11

**Q.43** Who else helped in responding for this interview?

Yes	1
No	2
If yes,	
Sample person	1
Mother of sample person	2
Father of sample person	3
Wife of sample person	4
Husband of sample person	5
Daughter of SP	6
Son of SP	7
Grandchild of SP	8
Friend, partner, non relative	9
Care provider or caretaker	10
Other relative	11
Other, specify	12

**Q. 44** Did you or the respondent have difficulty or any comments about this supplement interview?

Yes	1	
No	2	<i>If no....questionnaire ends</i>

If yes....What were the reasons for this difficulty or comments about this interview?

Did not understand questions	1
Not familiar with handcards	2
Did not have handcards	3
Poor memory of supplements taken	4
Sick	5
Hearing impairment	6
Telephone connection problems	7
Interruptions	8
Uncooperative/impatient	9
Distracted/uninterested	10
Supplement list may be incomplete (explain in remark box)	11
Unreliable (explain in remark box)	12
Not ascertained	13
Other specify (explain in remark box)	14

# Antacid Label Information



Strength

Form



Manufacturer/City/State

# Supplement Label Information





### Appendix 3: Matching Codes

1. **Exact or near exact match**; this is the only product that could match this entry.
2. **Probable match**; the match is not exact, but knowledge of the company's products strongly suggests that this is the only possible match choice. For example the entry may not specify strength or include words such as timed release, but no other options are available for this brand according to manufacturer or retailer information.
3. **Generic match**; product has known strength for all ingredients, either a) as part of name (e.g. vitamin C 500 mg) or b) because the manufacturer is known. Thus the ingredients and amounts are considered to be accurate despite an exact brand match.
4. **Reasonable match**; the product name may be incomplete or could be complete but other products of this brand also start with these same words so this cannot be assured. In these cases, the entered name is matched to either: a) the most frequently reported of these products in the NHANES 2003-2004 data until HANDLS database expands, if this could be determined; b) the best selling product by this company that matches the entered name; or c) the most basic product by this company, as assessed by label wording.
5. **Default match**; the exact product could not be obtained because the name was imprecise or the exact brand product could not be located and no generic could be assigned. In these cases, the entered product was matched to a created default product based upon: a) the most commonly reported strengths for single ingredients; b) the most commonly reported brands for major multiple ingredient products such as multivitamins and multivitamin/multiminerals for children, seniors, or adults, if available; or c) products manufactured by a large, private-label manufacturer. According to NHANES 1999-2000 data and sales data indicate that far more people take multivitamin/multiminerals rather than just multivitamins; that numerous supplement labels calling a product a multivitamin actually also contain minerals; and that products that only exist as multivitamin/minerals are often named by NHANES participants as multivitamins, supplements recorded as multivitamins without further identifying information are matched to multivitamin/multiminerals, not multivitamins.
6. **No match**; no product could be found and there was not enough detail in the name to assign a generic or default match with any confidence. The words "no product information available" are listed as the product name.
7. **Refused**; product name was refused.
8. **Don't know**; product name was not known.



## Appendix 4: NHANES Created Default Supplements and Antacids

<b>Default Supplement</b>	<b>Assigned Strength or Supplement</b>	<b>Selection of Assigned Strength or Supplement Based On:</b>
Alfalfa	500 mg	Most Commonly Reported Strength
Aloe Vera Gel	25 mg	Commonly Available Strength
B 50 B-Complex	Vitasmart B 50 B-Complex	Commonly Available Product
Balanced B 100 B-Complex	Vitasmart Balanced B 100 B-Complex	Commonly Available Product
B-Complex With Vitamin C	Nature Made B-Complex With Vitamin C	Commonly Available Product
Beta Carotene	25,000 IU	Most Commonly Reported Strength
Betaine Hydrochloride	650 mg	Commonly Available Strength
Bilberry	80 mg	Commonly Available Strength
Biotin	1000 mcg	Commonly Available Strength
Black Cohosh	540 mg	Most Commonly Reported Strength
Calcium	600 mg	Most Commonly Reported Strength
Calcium & Magnesium	Calcium 1000 mg, Magnesium 500 mg	Commonly Available Strength
Calcium + Magnesium 125 mg	Calcium 250 mg, Magnesium 125 mg	Commonly Available Strength
Calcium + Magnesium Liquid	Calcium 1000 mg, Magnesium 500 mg	Commonly Available Strength
Calcium + Soy	Caltrate 600 + Soy with Soy Isoflavones	Commonly Available Product



**Appendix 4: NHANES Created Default Supplements and Antacids, continued**

<b>Default Supplement</b>	<b>Assigned Strength or Supplement</b>	<b>Selection of Assigned Strength or Supplement Based On:</b>
Calcium + Vitamin D 125 IU	Calcium 500 mg, Vitamin D 125 IU	Most Commonly Reported Strength
Calcium 250 mg With Vitamin D	Calcium 250 mg, Vitamin D 125 IU	Commonly Available Strength
Calcium 500 mg With Vitamin D	Calcium 500 mg, Vitamin D 200 IU	Most Commonly Reported Strength
Calcium 600 mg With Vitamin D	Calcium 600 mg, Vitamin D 200 IU	Most Commonly Reported Strength
Calcium 630 mg With Vitamin D	Calcium 630 mg, Vitamin D 400 IU	Commonly Available Strength
Calcium 800 mg With Vitamin D	Calcium 800 mg, Vitamin D 200 IU	Commonly Available Strength
Calcium Magnesium & Zinc	Vitasmart Calcium Magnesium & Zinc	Commonly Available Product
Calcium Polycarbophil Caplets	Fibercon	Commonly Available Product
Calcium With Vitamin D	Calcium 600 mg, Vitamin D 200 IU	Most Commonly Reported Strength
Chewable Multivitamin With Fluoride	Copley Chewable Multivitamin With Fluoride (1mg)	Commonly Available Product

#### Appendix 4: NHANES Created Default Supplements and Antacids, continued

<b>Default Supplement</b>	<b>Assigned Strength or Supplement</b>	<b>Selection of Assigned Strength or Supplement Based On:</b>
Children's Multivitamin/Multimineral	Flintstones Complete Children's Multivitamin/Multimineral	Commonly Available Product
Children's Multivitamins Plus Iron	Flintstones Plus Iron Children's Multivitamins	Commonly Available Product
Chromium Picolinate	Chromium 200 mcg	Most Commonly Reported Strength
Cod Liver Oil Softgels	Vitasmart Cod Liver Oil Softgels	Commonly Available Product
Coenzyme Q-10	50 mg	Most Commonly Reported Strength
Copper	2 mg	Commonly Available Strength
Cranberry	300 mg	Commonly Available Strength
Creatine Monohydrate	5000 mg (5 G)	Most Commonly Reported Strength
Daily Multiple Vitamins Plus Iron	Perrigo Daily Multiple Vitamins Plus Iron	Commonly Available Product
Dairy Digestive Caplets	Lactaid Original Formula	Commonly Available Product
Echinacea	400 mg	Most Commonly Reported Strength
Echinacea & Goldenseal	Echinacea 100 mg, Goldenseal 100 mg	Commonly Available Strength
Ester-C	Your Life Ester-C 500 mg With Bioflavonoids	Commonly Available Product
Fat Burner	Weider Fat Burners	Commonly Available Product
Fish Oil	1000 mg	Most Commonly Reported Strength

#### Appendix 4: NHANES Created Default Supplements and Antacids, continued

<b>Default Supplement</b>	<b>Assigned Strength or Supplement</b>	<b>Selection of Assigned Strength or Supplement Based On:</b>
Flax Seed Oil	1000 mg	Commonly Available Strength
Flaxseed and Borage Oil	Spectrum Essentials Flax Borage Oil	Commonly Available Product
Fluoride Tabs	Sodium Fluoride 1.1 mg	Commonly Available Strength
Folic Acid	400 mcg	Most Commonly Reported Strength
Garlic	500 mg	Most Commonly Reported Strength
Gelatin	600 mg	Commonly Available Strength
Ginkgo Biloba	60 mg	Most Commonly Reported Strength
Ginseng	500 mg	Most Commonly Reported Strength
Glucosamine	500 mg	Commonly Available Strength
Glucosamine Chondroitin	Glucosamine 500 mg, Chondroitin 400 mg	Commonly Available Strength
Glucosamine Chondroitin & MSM	Spring Valley Glucosamine Chondroitin Plus MSM	Commonly Available Product
Grapeseed Extract	150 mg	Most Commonly Reported Strength
Gummy Bear Multivitamin	L'il Critters Gummy Vites	Commonly Available Product
Iron	65 mg	Most Commonly Reported Strength
Lactobacillus Acidophilus	10 mg	Commonly Available Strength

**Appendix 4: NHANES Created Default Supplements and Antacids, continued**

<b>Default Supplement</b>	<b>Assigned Strength or Supplement</b>	<b>Selection of Assigned Strength or Supplement Based On:</b>
Lecithin	1200 mg	Most Commonly Reported Strength
Liquid Colloidal Minerals	GNC Liquid Multi Colloidal Minerals	Commonly Available Product
Lysine	500 mg	Most Commonly Reported Strength
Magnesium	250 mg	Most Commonly Reported Strength
Men's Multivitamin/Multimineral	One A Day Men's Health Formula	Most Commonly Reported Product
MSM	1000 mg	Most Commonly Reported Strength
Multivitamin / Multimineral	Centrum Advanced Formula High Potency Multivitamin Multimineral with Lutein / Lycopene	Most Commonly Reported Product
Multivitamin And Fluoride Drops	Enfamil Poly-Vi-Flor 0.25 mg Multivitamin And Fluoride Drops	Commonly Available Product
Multivitamin Plus Iron	The Medicine Shoppe Daily Multiple Vitamins Plus Iron	Commonly Available Product
Niacin (Vitamin B-3)	500 mg	Most Commonly Reported Strength
PABA	100 mg	Commonly Available Strength
Pantothenic Acid (Vitamin B-5)	250 mg	Most Commonly Reported Strength
Pediatric Iron Drops	Fer-In-Sol Iron Drops	Commonly Available Product

## Appendix 4: NHANES Created Default Supplements and Antacids, continued

<b>Default Supplement</b>	<b>Assigned Strength or Supplement</b>	<b>Selection of Assigned Strength or Supplement Based On:</b>
Polyvitamin And Fluoride Chewable Tablets	Enfamil Poly-Vi-Flor 0.25 mg Multivitamin And Fluoride Chewable Tablets	Commonly Available Product
Polyvitamin Chewable Tablets	Enfamil Poly-Vi-Sol Multivitamin Chewable Tablets	Commonly Available Product
Poly-Vitamin Drops	Enfamil Poly-Vi-Sol Vitamin Drops	Commonly Available Product
Potassium	99 mg	Most Commonly Reported Strength
Prenatal Vitamins	Stuart Prenatal Vitamins	Commonly Available Product
Protein Powder	GNC Pro Performance 100% Whey Protein Instantized, Chocolate Powder	Commonly Available Product
Psyllium Fiber	Metamucil Powder Original Texture Regular Flavor Dietary Fiber	Most Commonly Reported Product
Saw Palmetto	160 mg	Commonly Available Strength
Selenium	200 mcg	Most Commonly Reported Strength
Senior Multivitamin / Multimineral	Centrum Silver Multivitamin / Multimineral For Adults 50+ From A To Zinc with Lutein / Lycopene	Most Commonly Reported Product
Shark Cartilage	500 mg	Commonly Available Strength
Siberian Ginseng	500 mg	Commonly Available Strength
Sodium Fluoride Drops	Teva Sodium Fluoride Drops Rx Only (0.25 mg)	Commonly Available Product

**Appendix 4: NHANES Created Default Supplements and Antacids, continued**

<b>Default Supplement</b>	<b>Assigned Strength or Supplement</b>	<b>Selection of Assigned Strength or Supplement Based On:</b>
St. John's Wort	300 mg	Most Commonly Reported Strength
Stress Vitamins	Perrigo Stress Formula High Potency Stress Formula Vitamins	Commonly Available Product
Tri-Vitamin Drops	Enfamil Tri-Vi-Sol Vitamins A, D, & C Drops	Commonly Available Product
Tri-Vitamin With Fluoride Drops	Enfamil Tri-Vi-Flor 0.25 mg Vitamins A, D, C And Fluoride Drops	Most Commonly Reported Product
Vitamin A	10,000 IU	Most Commonly Reported Strength
Vitamin A & D	Vitamin A 1000 IU, Vitamin D 400 IU	Commonly Available Strength
Vitamin A 5000 IU + Vitamin D	Vitamin A 5000 IU, Vitamin D 400 IU	Commonly Available Strength
Vitamin B-1 (Thiamin)	100 mg	Most Commonly Reported Strength
Vitamin B-12	500 mcg	Most Commonly Reported Strength
Vitamin B-6	100 mg	Most Commonly Reported Strength
Vitamin B-Complex	Member's Mark Vitamin B-Complex	Commonly Available Product
Vitamin C	500 mg	Most Commonly Reported Strength
Vitamin D	400 IU	Most Commonly Reported Strength

**Appendix 4: NHANES Created Default Supplements and Antacids, continued**

<b>Default Supplement</b>	<b>Assigned Strength or Supplement</b>	<b>Selection of Assigned Strength or Supplement Based On:</b>
Vitamin D Liquid	400 IU	Commonly Available Strength
Vitamin E	400 IU	Most Commonly Reported Strength
Vitamins C & E	Vitamin C 500 mg, Vitamin E 400 IU	Commonly Available Strength
Whey Protein	GNC Pro Performance 100% Whey Protein	Commonly Available Product
Zinc	50 mg	Most Commonly Reported Strength
<b>Default Antacid</b>	<b>Antacid Assigned</b>	<b>Selection of Assigned Antacid Based On:</b>
Default Antacid Anti-Gas Liquid	Mylanta Regular Strength Antacid Anti-Gas Liquid	Commonly Available Product
Default Antacid Liquid	Maalox Antacid Liquid	Commonly Available Product
Default Calcium Antacid	Tums Regular Strength	Commonly Available Product
Default Calcium and Magnesium Antacid Tablets	Rolaids Original Antacid	Commonly Available Product
Default Calcium Antacid Maximum Strength Tablets	Tums Ultra Maximum Strength	Commonly Available Product

### Appendix 5: Source of Supplement Information

Code	Label
1	Manufacturer
2	Directly from Distributor
4	Inferred from supplement name
5	Physician's Desk reference (PDR)
7	Product Catalog
8	Internet Listing
9	Supplement Label
10	Supplement from the same manufacturer
11	NHANES- for generic and default

Some numbers are skipped intentionally as the associated sources weren't used.

### Appendix 6: Formulation Type

Code	Label
1	Standard formulation
2	Mature formulation (formulation for older adults)
3	Prenatal formulation
4	Pediatric



## Appendix 7: Rules For Classifying Ingredients

### VITAMINS

#### **An ingredient is classified as a vitamin if it is:**

- A single vitamin listed by its name (e.g. vitamin A)
- A standard chemical form of the vitamin (retinol, retinal, retinoic acid) in synthetic or natural form

#### **A vitamin will be classified as Other when it exists as:**

- A precursor or provitamin to the active form of the vitamin (e.g. 7-dehydrocholesterol, a precursor to Vitamin D)
- A complex, since the ingredient content is unclear (e.g. B-complex)

#### **The following appear in supplements as a source of vitamins and are therefore classified as a vitamin:**

- Vitamin A: palmitate, vitamin A acetate, vitamin A palmitate
- Vitamin B-1/Thiamin: thiamin monophosphate or TMP, thiamin mononitrate, thiamin hydrochloride
- Vitamin B-2/Riboflavin: riboflavin mononitrate, riboflavin-5-phosphate sodium
- Vitamin B-3/Niacin
- Vitamin B-5/Pantothenic Acid: pantothenate, calcium pantothenate
- Vitamin B-6: pyridoxine hydrochloride, vitamin B<sub>6</sub> hydrochloride
- Vitamin B-12/Cobalamin: cyanocobalamin
- Vitamin C/Ascorbic Acid: ascorbyl palmitate, sodium ascorbate
- Vitamin D/Calciferol: cholecalciferol, ergocalciferol, calcitriol
- Vitamin E/Tocopherol: d-alpha tocopheryl acid succinate, dl-alpha tocopheryl acetate, d-alpha tocopheryl acetate, d-alpha tocopherol, d-alpha tocopheryl, tocopherols, mixed tocopherols, vitamin E acetate, tocotrienol
- Vitamin K/Menadione: phytonadione
- Biotin: Choline, choline bitartrate
- Folic Acid/Folate

## Appendix 7: Rules For Classifying Ingredients, continued

### **MINERALS**

**An ingredient is classified as a mineral if it is a macro or micromineral (trace element):**

- in its elemental form (e.g. iron)
- is the source of the mineral in a supplement (e.g. ferrous gluconate, potassium iodide, nickel chloride).

**An ingredient containing a mineral is classified as Other when it is:**

- an enzyme (e.g. boron protease)
- a complex, since the ingredient content is unclear (e.g. Trace Mineral Complex)
- used as an electrolyte (chloride, potassium, sodium)

**The following are classified as minerals:**

Arsenic	Copper	Phosphorus
Barium	Fluoride	Selenium
Boron	Iodine	Silicon
Bromine	Iron	Strontium
Cadmium	Magnesium	Sulfur
Calcium	Manganese	Tin
Chromium	Molybdenum	Vanadium
Cobalt	Nickel	Zinc

### **BOTANICALS**

**An ingredient is classified as a botanical if it is:**

- part of a plant, tree, shrub, herb, algae etc.

**Botanicals may include the following words:**

- Extract, Powder
- Leaf, Root, Flower, Stem, Peel, Fruit
- Component of a botanical that specifically mentions it is from the plant (e.g. soy isoflavones, citrus bioflavonoids)

**An ingredient containing a botanical is classified as Other if it is:**

- listed only as an unspecified blend
- a chemical structure derived originally from a botanical (e.g. bromelain, the enzyme found in pineapple; Alliin, a phytochemical in garlic; apple cider vinegar)

## Appendix 7: Rules For Classifying Ingredients, continued

### AMINO ACIDS AND PROTEIN

**An ingredient is classified as an amino acid if it is an essential or nonessential amino acid. It can exist in:**

- it's free form (e.g. lycine, glutamine)
- its post-translational form with one or two added groups (e.g. Cystine, Hydroxyl sine, Hydroxyproline, Dimethylglycine, and 3-methylhistidine)
- one of its isomeric forms (e.g. l-tyrosine)
- the source of an amino acid in a supplement (e.g. l-lysine monohydrochloride, glutamic acid hydrochloride)

**An amino acid would be classified as Other if it is:**

- in its post-translational form with three or more added groups (Trimethylglycine, Tetramethylglycine, etc.)
- an alpha-keto acid (an amino acid with its amino group, NH<sub>3</sub>, replaced by a keto group) (e.g.  $\alpha$ -ketoglutarate)
- a residue of an amino acid ((-carboxyglutamic acid also known as GLA)
- as a complex of amino acids (e.g. natural amino acid complex), since the ingredient content is unclear

The following are classified as amino acids:

Alanine	Glycine	Proline
Arginine	Histidine	Serine
Asparagine	Isoleucine	Taurine
Aspartic Acid	Leucine	Threonine
Cysteine	Lysine	Tryptophan
Glutamic Acid	Methionine	Tyrosine
Glutamine	Phenylalanine	Valine

## **FATS**

The following are examples of would be classified as a fat:

Fish oils, cholesterol

## **FIBER**

## **CARBOHYDRATES AND SUGAR**

### **Appendix 7: Rules For Classifying Ingredients, continued**

## **OTHER**

The following are examples of ingredients that would be classified as other:

an electrolyte (e.g. chloride, potassium, sodium)

a hormone (e.g. DHEA), unless if it is the active form of a vitamin (calcitriol)

an enzyme (e.g. cellulase, glucoamylase)

Complexes and blends (unless all components are of the same type  
ex. amino acid blend)

Bioflavonoids and Isoflavones (if not associated with a plant, in which  
case it would be classified as a Botanical

Vinegars

Phytochemicals (e.g. lutein, allin)

Vitamin precursors, e.g. some carotenoids

## Appendix 8: Reported Dosage Units

<b>Code</b>	<b>Label</b>
1	Tablets, capsules, pills, caplets, softgels, gelcaps, vegicaps
2	Droppers
3	Drops
5	Injections/Shots
6	Lozenges
7	Milliliters
10	Powder/Granules
11	Tablespoons
12	Teaspoons
13	Wafers
15	Cans
16	Grams
17	Dots
18	Cups
19	Sprays/Squirts
20	Chews
21	Scoop
22	CC
23	Capful
24	MG
25	Units
26	Gulp
27	Ounces

**Appendix 8: Reported Serving Size Units, continued**

<b>Code</b>	<b>Label</b>
28	Packages/Packets
29	Vial
30	Gumball

## Appendix 9: Reasons for Taking Supplements

Code	Label
10	For good bowel/colon health
11	For prostate health
12	For mental health, dementia, memory
13	To prevent health problems
14	To improve my overall health, nails, hair, cleanse, liver
15	For teeth, prevent cavities
16	To supplement diet because I don't get enough from food
17	To maintain health to stay healthy
18	To prevent colds, boost immune system
19	For heart health, cholesterol, circulation, blood pressure, triglycerides, Elevated CRP, omega 3
20	For eye health, macular degeneration
21	For healthy joints, arthritis
22	For skin health, dry skin
23	For weight loss, lap band surgery, gastric bypass surgery
24	For bone health, build strong bones, osteoporosis
25	To get more energy
26	For pregnancy
27	For anemia, such as low iron, low folate
28	Lactose intolerance
29	Acid reflux, GERD, heartburn, indigestion
30	Vitamin inadequacy or deficiency (Vitamins B12, D)
31	Women's health, breast cancer, cancer survivor, hot flashes
32	Diabetes
33	Gastrointestinal health (fiber, probiotics)

34	Doctor recommended
37	Muscle strength, to gain muscle mass, fitness
38	For kidney health, dialysis, urinary tract infection
39	Muscle cramps
91	Other specify
77	Refused
99	Don't know



**Appendix 10: Label Serving Size Units**

<b>Code</b>	<b>Label</b>
1	Caplet
2	Capsule
3	Dropper
4	Drop
5	Fluid Ounce
6	Gel Cap
8	Injection/Shot
9	Lozenge
10	Milliliter
12	Package/Packet
13	Pill
14	Tablespoon/Powder
16	Softgel
17	Tablespoon/Liquid
18	Tablet
19	Teaspoon/Liquid
20	Wafer

**Appendix 10: Label Serving Size Units, continued**

<b>Code</b>	<b>Label</b>
21	Ounce/Powder
22	Spray/Squirt
24	Scoop/Powder
25	Cup/Powder
27	Chew
28	Other
29	Vegicap
30	Can/Liquid
31	Capful
32	Gumball
33	Gram/Powder
34	Teaspoon/Powder
35	Can/Powder
36	Scoop/Liquid
37	Cup/Liquid
38	Gram/Liquid
39	Drop/Lozenge
99	Unknown Dosage Form

## Appendix 11: Ingredient Units

Code	Label
1	mg
2	IU
3	%
4	mcg
5	gm
6	mL
7	Kcal
8	DU
9	HUT
10	LU
11	CU
12	endo-PGO
13	AGU
14	PPM
15	Million
16	Billion
17	LacU
18	X
19	PPB
20	Trace
21	Unknown
22	PU
23	SEU
24	InvU

### Appendix 11: Ingredient Units, continued

<b>Code</b>	<b>Label</b>
25	°DP
26	HCU
27	GFU
28	GALU
29	ALU
30	FTU
31	NG

### Appendix 12: Ingredient Classification

<b>Code</b>	<b>Label</b>
1	Vitamin
2	Mineral
3	Botanical
4	Other
5	Amino Acid
6	Fat
7	Fiber
8	Carbohydrate, Sugar

## Appendix 13: Description of Statistical Analysis to Create Supplemental Nutrient File

**Supplemental nutrient intake** was estimated using information provided from several ingredient-level, supplement and individual-level databases, by going through the following steps: **(A)** A “nutrient ingredient” file (**File 4**) which is an ingredient-level database was manipulated to obtain separate variables estimating the quantity of each of the nutrients of interest within each supplement ID, after standardizing the unit of the quantity per nutrient. The same database was also manipulated to generate variables determining the category of each supplement ID (e.g. mineral supplement: 0=no, 1=yes) **(B)** The “nutrient ingredient” file was then collapsed by supplement ID, summing up both the nutrient quantities and the category to obtain a single record per supplement ID, making it a supplement-level database (**collapsed File 4**); **(C)** The collapsed file was then merged with the supplement-level database “supplement information” (**File 3**); **(D)** The file that combines **collapsed File 4** with **File 3** was then merged by supplement ID with an individual-level database describing reasons for use of each supplements as well as dosage and length (**File 2: “Supplement Records”**). The resulting file was named **collapsedFile4\_File3\_File2** **(E) File 2 (Supplement Records)** was then merged with **File 1 (Supplement counts)** by individual-level ID, to create the length variables for using each of category of supplements (i.e. days of use of OTC, antacid and prescription supplements). This was done by collapsing the file by individual-level ID and averaging out the days of use per individual. The resulting file is named **File1\_File2\_length**. **(F) collapsedFile4\_File3\_File2** was then merged by individual-level ID with **File1\_File2\_length** and with **File1**. The resulting file was named **files1\_2\_3\_4\_collapse\_merged**; **(G)** Using the last merged file in (F) (supplement-level and individual-level database), a number of variables were created and those were: **G.1. Daily intake of each nutrient:** This was done by multiplying the amount of the nutrient in each

supplement by the quantity used per individual and dividing that value by the serving quantity to obtain a standardized amount per individual and per supplement. If the individual did not use a supplement with a specific nutrient, the value was entered as zero; **G.2. Daily intake  $\times$  length of each nutrient:** This set of variables was computed by multiplying daily intake of each nutrient with the length of use within each supplement and each individual; **G.3. Length of use (in days) of each nutrient:** This set of variables was computed by assigning length of use in days to each supplement and each individual whenever daily use of a specific nutrient was  $>0$ ; **G.4. Reason for use of each supplement.** A set of 36 binary variables (yes/no) were created per supplement and per individual denoting whether the supplement used by a specific individual was used for a certain pre-coded reason. **(H)** For the data to be usable, a series of data management procedures were done to sum up or average values of variables created in previous steps across supplement IDs and within each individual-level ID. Prior to this step, the database obtained in (G) was subset to day 1 and day 2 of intakes in wave 3. Within each day, collapsing by individual-level ID was done as follows: **(H.1.) Means:** mean days of use of OTC, antacid and prescription supplements, use of each of those categories (yes/no) and count of each of those categories; **(H.2) Summation:** Variables created in **G.1.**, **G.2.**, **G.3.** and **G.4.** The same process was done for day 2 of intake **(I)** The resulting databases which are individual-level were appended and each variable was averaged by individual-level ID to obtain a final dataset with all usable variables; **(J)** Reasons for supplement use were combined after examining their individual frequency distributions for the purpose of simplicity. All variables were labelled including units.