National Health and Nutrition Examination Survey 1999–2000

Documentation, Codebook, and Frequencies

Surplus Specimen Laboratory Component:
Cystatin C (Surplus Sera)

Survey Years:
1999 to 2000

SAS Export File:
SSCYST_A.XPT

First Published: June 2008
Last revised: N/A

NHANES 1999-2000 Data Documentation

Laboratory Assessment: Cystatin C (NHANES Surplus Sera) (SSCYST_A)

First Published: June 2008 **Last Revised:** N/A

Component Description

Cystatin C assayed from stored serum samples from NHANES 1999-2000.

Eligible Sample

All participants aged 60+ with available specimen and a 25% random sample of participants aged 12-59 years. This younger group is supplemented with all individuals with high serum creatinine 1.2 mg/dl in men and >1.0 mg/dl in women) after calibration.

Description of Laboratory Methodology

All assays were conducted using the Dade Behring N Latex Cystatin C assay which is an automated particle-enhanced nephelometric assay (PENIA) run on the Dade Behring Nephelometer II (BNII) (1).

Laboratory Quality Control and Monitoring

This assay has an intra-assay imprecision of 2.0 - 3.0% coefficient of variation and an inter-assay imprecision of 3.2 - 4.4% coefficient of variation. The assay range is 0.23 - 7.25 mg/dL. A thorough review of different assay methodologies by Newman (2) concluded that it is the most precise automated assay across the clinical concentration range and performed slightly better than the other automated assays in terms of sensitivity and lack of analytical interference.

Data Processing and Editing

All data will be made publicly available.

Analytic Notes

The sub-sample of participants aged 12-59 requires modification of original sampling weights. Weights will be provided by investigators to NCHS and will be adjusted by age, sex, race, and serum creatinine strata to match the original NHANES 1999-2000 design.

References

(1) Finney H, Newman DJ, Gruber W, Merle P, Price CP. Initial evaluation of cystatin C measurement by particle-enhanced immunonephelometry on the Behring nephelometer systems (BNA, BN II). Clin Chem 1997; 43(6 Pt 1):1016-1022.

(2) Newman DJ. Cystatin C. Ann Clin Biochem 2002; 39(Pt 2):89-104.

Acknowledgement

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Locator Fields

Title: Cystatin C

Contact Number: 1-866-441-NCHS

Years of Content: 1999-2000

First Published: June 2008

Revised: N/A

Access Constraints: None

Use Constraints: None

Geographic Coverage: National

Subject: Serum Cystatin C

Record Source: NHANES 1999-2000

Survey Methodology: NHANES 1999-2000 is a stratified multistage probability sample of the civilian non-institutionalized population of the U.S.

Medium: NHANES Web site; SAS transport files

National Health and Nutrition Examination Survey
Codebook for Data Production (1999-2000)

Cystatin C (SSCYST_A)

June 2008

SEQN	Target
	B(12 Yrs. to 150 Yrs.)
Hard Edits	**SAS Label**
	Respondent sequence number
English Text: Respondent sequence number.	
English Instructions:	

SSCYPC	Target
	B(12 Yrs. to 150 Yrs.)
Hard Edits	**SAS Label**
	Cystatin C (mg/L)
English Text: Cystatin C (mg/L)	
English Instructions:	

Code or Value	Description	Count	Cumulative	Skip to Item
0.47 to 7.15	Range of Values	2714	2714	
.	Missing	38	2752	

WTSCY4YR	Target
	B(12 Yrs. to 150 Yrs.)
Hard Edits	**SAS Label**
	Surplus sera cystatin 99-02 weights
English Text: Surplus sera cystatin 99-02 weights	
English Instructions:	

Code or Value	Description	Count	Cumulative	Skip to Item
0 to 418199.9809	Range of Values	2752	2752	
.	Missing	0	2752	