Summary. This paper presents the findings on depressive symptomatology and major depressive disorder in Cuban American respondents to the Hispanic Health and Nutrition Examination Survey (HHANES). The HHANES represents the first population-based assessment of the mental health status of Cuban Americans. High levels of depression, as measured by a CES-D score of 16 or more, were found in ten percent of the sample. Female gender was independently associated with CES-D caseness. The lifetime, six-month, and one-month prevalence rates of major depressive disorder, as measured by the National Institute of Mental Health Diagnostic Interview Schedule (DIS), were 3.15%, 2.12%, and 1.50%, respectively. An income level of less than ten thousand dollars was independently associated with a lifetime diagnosis of major depression.

Cuban Americans comprise the third largest group of Hispanics living in the United States, after Mexican Americans and Puerto Ricans. While health research on all Hispanic American groups continues to be needed, Cuban Americans are perhaps the least extensively studied of the major Hispanic groups, and relatively little research has been done specifically addressing their mental health status. This study will report results of data obtained from Cuban American respondents on depression and depressive symptoms, collected for the Hispanic Health and Nutrition Examination Survey (HHANES). The HHANES targeted three distinct Hispanic populations: in addition to Cuban Americans, Mexican Americans and Puerto Ricans living outside of Puerto Rico were also surveyed. This survey represents the first population-based mental health assessment of Cuban Americans.

Previously published data on mental disorders and psychiatric symptoms in Cuban Americans are sparse. Mościcki et al. (1987) presented preliminary data from the HHANES in which the prevalence of significant depressive symptomatology in Cuban Americans, measured by the Center for Epidemiologic Studies Depression Scale (CES-D), was 10.2%. The lifetime, six-month, and one-month prevalence rates for major depressive episode, as measured by the National Institute of Mental Health Diagnostic Interview Schedule (DIS), were 3.5%, 2.2%, and 1.5% respectively. Unadjusted CES-D caseness rates were found to be significantly higher in women, in widows compared to married persons, in the unemployed, and in those respondents who were below the poverty level. Unadjusted six-month prevalence rates of major depressive episode did not differ by various sociodemographic variables. Multivariate analyses were not performed for this preliminary study, so the independent contribution of these sociodemographic variables to risk of depression was not reported.

Ruiz (1982) described several clinical manifestations of mental illness that he believed were specific to Cuban Americans, in addition to the commonly accepted psychiatric disorders. These were transient paranoia, adaptive anxiety, depressive reactions secondary to diaspora, and intrafamilial role identification crisis. He also commented that the expression of behaviors such as substance abuse and homosexuality were markedly different in Cuban Americans than in Anglos.

In 1982, psychiatric evaluations were given to the 3,035 remaining members of the 1980 Mariel boatlift who had not yet been sponsored in this country, all of whom were in detention facilities. Results of these evaluations were published in 1985 by Silver et al. Of the 1,307 immigrants who presented psychiatric symptoms, the authors assigned a DSM-III primary diagnosis of personality disorder to 26%, schizophrenia 15%, mental retardation 8.6%, chronic alcohol abuse 8.6%, and major depression 7.2%. This study, while useful and interesting on its own, obviously reports on a highly selected and uniquely stressed group. Its results therefore cannot be construed as representative of the mental health status of Cubans or Cuban Americans.

Several studies of Cuban Americans have been published which have provided information relevant to research on mental disorders, such as acculturation and eth-
nic awareness (Portes 1984; Szapocznik and Kurtines 1980), cultural and social characteristics (Sandoval and Tozo 1975; Szapocznik et al. 1978; Ruiz 1987; Alonso and Jeffrey 1988), mortality patterns (Shai and Rosenwaike 1988; Rosenwaike 1987), and health care utilization (Schur et al. 1987; Ruiz 1987, Sandoval 1979). Two articles published in 1975 (Lefley; Sandoval and Tozo) described the establishment of culturally sensitive Community Mental Health Centers in areas of Miami with large Cuban populations, but no specific data were provided on the rates of mental disorders in these communities. Treatment of depression in elderly Cuban Americans has also received some attention (Szapocznik et al. 1981, 1982), as has the role of the Santeria religion in concepts of mental illness and health care (Sandoval 1977, 1979; Pasquali 1986; Alonso and Jeffrey 1988).

Several psychiatric epidemiologic studies of depression in Hispanic Americans have been conducted using the CES-D and the DIS. The bulk of these studies has been done with Mexican American subjects. Studies that have used the CES-D to assess depressive symptomatology in Mexican Americans have produced overall prevalence rates of significant depressive symptoms that range from 13.3% to 28.9% (Frerichs et al. 1981; Vernon and Roberts 1982; Mościcki et al. 1989). The National Institute of Mental Health Epidemiologic Catchment Area (ECA) study utilized the National Institute of Mental Health Diagnostic Interview Schedule (DIS) to assess a variety of mental disorders in the household and institutional populations of five U.S. sites. One of these sites, in Los Angeles, oversampled Mexican Americans. A lifetime prevalence rate of 4.9% (Karno et al. 1987) and a six month prevalence rate of 3.0% (Burnham et al. 1987a) for major depressive episode in Mexican American household respondents were reported. Previously published results from the Hispanic HANES have shown the prevalence of CES-D caseness in Mexican Americans to be 13.1% (Mościcki et al. 1989) and in Puerto Ricans to be 27.7%. The lifetime, six-month, and one-month major depressive episode prevalence rates were 4.2%, 2.3%, and 1.8% respectively for Mexican Americans and 9.0%, 5.8%, and 4.9% for Puerto Ricans (Mościcki et al. 1987).

Methods

The HHANES, conducted from July, 1982 through December, 1984, was the first nationwide population-based survey of the health and nutrition status of Hispanic Americans. All instruments used in the HHANES were available in both English and Spanish. The Spanish translation was derived from the English version using a forward-back translation methodology and tested among each of the three ethnic groups surveyed in the HHANES. Interviewers were bilingual in English and Spanish and almost all were Hispanic. No attempt was made to identify any participant’s residence status as documented or undocumented, since such an attempt could have had a dampening effect on the rate of participation in the survey (National Center for Health Statistics 1985).

Like the National Health and Nutrition Examination Surveys, the HHANES used a complex, multistage, stratified, clustered sampling scheme. However, instead of a national probability sample, the HHANES targeted civilian noninstitutionalized Hispanics – Mexican Americans in the Southwest, Puerto Ricans in the New York City area, and Cuban Americans in Dade County, Florida. The HHANES Cuban American universe consisted of only one primary sampling unit (PSU), which contained about 57% of the 1980 Cuban-origin population of the United States. From this universe, direct statistical inferences can be made for Cuban Americans living in Dade County (National Center for Health Statistics 1985).

For the Dade County survey, a sample household was deemed eligible for participation if one family member reported him- or herself to be Cuban or Cuban American. Any person in an eligible family was eligible to be selected for the extended interview and examination whether or not the person identified him- or herself as being Hispanic (National Center for Health Statistics 1985). The Cuban American HHANES sampled 2,244 persons aged 6 months to 74 years, of whom 1,766 were interviewed and 1,357 were examined (National Center for Health Statistics 1987a). The depression measures were administered to adults aged 20 to 74 in a mobile examination center after the physical examination (National Center for Health Statistics 1987b).

Measures of depression

The CES-D (Radloff 1977) is a 20-item scale originally developed to assess current depressive symptomatology in community settings. It is a widely used measure that has been shown to have good validity and reliability (Radloff 1977; Roberts 1980; Weissman et al. 1977). The Spanish language version of the CES-D has been used with acceptable results (Roberts 1980; Frerichs et al. 1981, Mościcki et al. 1989). The CES-D can be self-administered, although in the HHANES it was administered by an interviewer. Items on the scale cover four main factors – depressed affect, positive affect, somatic and retarded activity, and interpersonal (Radloff 1977). Responses to the items are made on a four-point scale, from zero (rarely or none of the time) to three (most or all of the time), and refer to how often the respondent has felt the item in the past week. A respondent’s score can range from zero to a maximum of sixty. A cutoff score of sixteen or above is conventionally used to indicate significant current depressive symptomatology, or caseness (Radloff and Locke 1986). The CES-D does not diagnose the presence or absence of clinical depressive disorders. In the HHANES, the CES-D was always administered after the DIS.

The DIS (Robins et al. 1981a, b) is an epidemiologic research instrument in which responses may be scored by computer to determine whether the subject meets criteria for a psychiatric diagnosis. It is short enough to administer in a single session and can be administered by lay interviewers. Diagnoses are made according to criteria set forth in the third edition of the American Psychiatric Association Diagnostic and Statistical Manual of Mental