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Political violence, psychosocial trauma, and the context of mental health services use among immigrant Latinos in the United States

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Abstract

Objectives—We present the prevalence of political violence (PV) of immigrant Latinos in the US, and perceived need for and correlates of mental health services use among this population.

Methods—We use the National Latino and Asian American Study (NLAAS), a nationally representative epidemiological survey of US Latinos, including a probability sample of 1630 immigrant Latinos. We use a conceptual framework that assumes a strong role of social and cultural factors in understanding the risk for psychopathology and mental health service use.

Results—Eleven percent of all immigrant Latinos reported PV exposure and 76% described additional lifetime traumas. Among those with a history of PV, an increased likelihood of using mental health services was associated with female gender, English language proficiency, experiencing personal assaults, higher perceived discrimination, and having an anxiety or substance disorder. Specific subgroups of Latinos, including men and Mexican immigrants, were less likely to access mental health services after experiencing PV. Perceived need for mental health services use is the strongest correlate of any lifetime and last 12 months service use.

Conclusions—The strong consequences of PV suggest the need for systematic screening and referral strategies. Specific outreach interventions focused on perceptions of need could be helpful for subgroups of Latinos including men who are particularly underrepresented in mental health services but who exhibit significant trauma histories.

Keywords

political violence; Latino; immigrant; trauma; mental health services use

INTRODUCTION

In many Latin American countries, violence is now among the five main causes of death, and is the principal cause of death in countries like Brazil, Colombia, Venezuela, El Salvador, and México (Hernandez, 2002; Buvinic, Morrison, & Shifter, 1999). Years of political strife and armed conflict in many Latin American countries have perpetuated the region's violence and political violence (PV) continues to be a critical public health concern for immigrants from Latin America along with exposure to other violence and psychosocial trauma (Asner-Self & Marotta, 2005). Unfortunately, immigrants often come to the US to struggle further, living in

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neighborhoods and communities with high levels of poverty and violence (Aponte, 1993; Crowley, Lichter, & Qian, 2006) and may experience significant levels of discrimination (Buvinic, Morrison, & Shifter, 1999; Smart & Smart, 1995). The physical health, mental health, and public health consequences of political violence for immigrants do not necessarily end upon crossing the US border but may be further exacerbated by immigration and the acculturation experience (Robison et al, 2003; Rousseau & Drapeau, 2004; Crowley, Lichter, & Qian, 2006). This paper examines implications for the needed health services response to political violence and trauma exposure among US immigrant populations. Specifically, we define political violence as collective violent action taken by people making political or power claims on each other or the state that leads to (often differential) physical and psychological damage inflicted on persons and communities (references).

The context of PV and its consequences are complex, and studies have shown that immigrant Latinos of diverse backgrounds have high rates of exposure with up to 54% of immigrants in clinical samples reporting exposure (Eisenman, et al, 2003). The types and intensity of PV exposure can vary by the political climate and the social status of an individual in their country of origin and relates to the intertwined nature and experience of social, political and personal conditions of war (Hernandez, 2002). However, PV exposure more generally has been associated with psychiatric disorders, especially post traumatic stress disorder, other anxiety disorders and depression (Eisenman, et al, 2003; Fox, et al, 2001; Jaycox et al., 2002; Martin-Baro & Canas, 1989; McCloskey, et al, 1995; Pedersen, 2002; Rousseau & Drapeau, 2004; Sabin, et al, 2003). Eisenman et al (2003) also found that Latino patients in primary care settings reporting exposure to PV had greater chronic pain, impaired physical functioning, and diminished health-related quality of life. However, even among Latino immigrants who access services, very few disclose their history of PV exposure to their physicians here in the United States and physicians often fail to screen or ask about these experiences in the clinical encounter (Eisenman, et al, 2003). The combination of exposure to violence and non-identification by providers has the potential to affect overall health, diagnosis, and access to treatments among this vulnerable population (Barcelona de Mendoza, 2001; Bauer, et al, 2000; Elliot, Quinless, & Parietti, 2000; Freudenberg, 2001).

Underutilization of mental health services use by Latinos exposed to PV may be explained by the usual healthcare barriers among immigrants including language, insurance, economic barriers, and documentation status (Perez & Fortuna, 2005). However, there may be other cultural issues that impact the perceived need for services in this population (Ruiz, 1998; Vega & Alegria, 2001). First, there may be some level of shame or hesitancy regarding discussing details of such events with health professionals especially when there is coexisting sexual trauma (Barthauer & Leventhal, 1999; Kogan, 2004). Men are more likely to be influenced by issues of stigma and unlikely to seek help for trauma, especially sexual trauma (Vega & Alegria, 2001). The very collective nature of political violence may also influence coping strategies towards using family and community supports rather than formal health services (Scharlach et al., 2006). Political violence may become a normative experience for some communities or at least not perceived as something warranting mental health or medical attention (Bleich, Gelkopf, & Solomon, 2003; Rousseau & Drapeau, 2004).

For immigrants and refugees, it is also important to consider the added effects of immigration exit circumstances and their potential mental health consequences via the added stressors of lost social supports and status, acculturative stress, and displacement out of their homes. Types of political violence exposure and subsequent contexts may also vary, having a differential impact on mental health needs and services use among specific Latino subgroups. Similarly, differences in experiences here in the US (socioeconomic, social status and structure of social supports) may influence or present additive stressors for certain groups. For example, Cuban immigrants who are able to access strong social, political and economic networks within ethnic

enclaves (U.S. Census Bureau, 2000) may experience a different circumstance than immigrants from El Salvador who may have less access to sociopolitical and economic resources in the US.

The study presented here was conducted using a conceptual framework used in the National Latino and Asian American Study (NLAAS) for investigating social, cultural and contextual factors of disease expression and services use (Alegria et al., 2004). The conceptual framework is a modification of psychiatric eco-epidemiology (Schwartz, Susser, & Susser, 1999) that assumes a strong role of context including social and cultural factors in understanding risk for psychopathology and illness for different ethnic/racial groups. In this framework, the risk for psychiatric problems and services use is linked to social position (e.g. education, income, social status in country of origin and here in the US); environmental context (e.g. neighborhood safety, exposure to violence) and psychosocial factors (e.g. family support, migration, acculturation, experienced discrimination and poverty (see Alegria et al, 2004 for more details). This framework allows for an examination of some of the complex circumstances and factors that interplay and effect Latino communities affected by both political violence and immigration and to test how some of these factors are associated with mental health service use and how PV exposed immigrant Latinos may differ in their needs as compared to non exposed immigrants and the general US Latino population.

Specifically, our purpose is to advance on previous research by: (1) Estimating the prevalence of PV exposure among diverse US immigrant Latinos using a nationally representative sample; (2) Examining the characteristics and contexts of those exposed to PV including demographics, immigration circumstances, types of traumatic exposure, social stressors and supports, perceived need and psychiatric disorders; and (3) Identify factors associated with any lifetime and 12 months mental health services use among immigrants with a history of PV exposure. We hypothesize that psychiatric diagnoses will be higher among Latino immigrants with PV than among non-exposed groups, and that having any psychiatric disorder and perceived need will be associated with services use in this population. We also hypothesize that other psychosocial stressors (perceived discrimination, acculturative stress, other traumatic exposure, less family support) will be associated with services use even when adjusting for psychiatric disorder.

METHODS

Sample Design and Data Collection Procedures

We use the data generated in the National Latino Asian American Study (NLAAS). A more detailed description of the sample design is described by Heeringa et al (2004). In brief, the NLAAS is based on a stratified area probability sample design of persons 18 years of age and older in the non-institutionalized population of the coterminous US. Latinos were divided into four strata (Puerto Rican, Cuban, Mexican and all Other Latinos) and country of origin was recorded for all participants. The University of Michigan's Institute for Social Research (ISR) conducted data collection using trained, multilingual interviewers to administer the NLAAS battery. See Pennell et al (2004) for a detailed description of the NLAAS data collection procedures. All study materials were translated into Spanish using a standard translation and back-translation protocol. The total sample includes 2554 Latinos with a response rate of 75.5%. The NLAAS sample is weighted using nationally representative survey weights as outlined by Heeringa et al (2004) to adjust for probability of selection and non-response. The total immigrant sample includes 1630 Latinos. Among immigrants, there were 428 with a self-reported history of political violence.

The International Review Board Committees of Cambridge Health Alliance, the University of Washington, and the University of Michigan approved all recruitment, consent, and interviewing procedures included in the NLAAS.

Measures

Definition and Exposure to Political Violence and Psychosocial Trauma—

Political violence exposure was obtained using the World Health Organization-Composite International Diagnostic Interview (WHO-CIDI) trauma questionnaire that is part of the Post Traumatic Stress Disorder assessment of the NLAAS. We selected the cluster of questions included by the CIDI that asked specifically about exposure to living within the context of political or military conflicts and/or being a political refugee. Therefore, political violence for our analyses is defined by the following questions: 1) participated in combat, either as a member of military or as a member of an organized nonmilitary group; 2) served as a peacemaker or relief worker in a war zone where there was ongoing terror of people because of political, ethnic, religious or other ethnic conflicts; 3) lived as an unarmed civilian in a place where there was a war, revolution, military coup or invasion; 4) lived as a civilian in a place where there was ongoing terror of civilians because of political, ethnic, religious or other ethnic conflicts; or 5) were a refugee—that is, did they ever flee from their home to a foreign country or place to escape danger or political persecution? For each endorsed exposure, the respondent was asked the age when the event first happened and how many times and how long they were exposed to the event. With these questions we aimed to elicit situations where the individual lived with, was victim to or participated in violent aspects of war or political conflict for which the literature supports there are social, political and individual consequences (Dejong, 2005; Hernandez, 2002).

In addition, we investigated the occurrence of other types of trauma among Latinos who were exposed to political violence as these may further the need for mental health services. Individuals experiencing one type of trauma are often at risk of having experienced other types of trauma (Kessler, 2000). These other traumas may be either related or not related to political violence but influential in mental health outcomes nonetheless. We have considered that exposure to political violence is not monolithic. For example, an individual may not have directly witnessed or been victim to violence but have lost a loved one due to political circumstances (e.g. desparacidos) or experienced other traumatic experiences like sexual abuse which contribute to their cumulative lifetime traumatic stress. We have grouped these other traumatic events into three categories: history of experienced personal assault (including experiencing physical abuse, sexual assault and rape, kidnapping or threats with a weapon), personal loss (including loss and death of a loved one), and witnessing violence towards others. A composite variable was created for each category by adding up positive responses for items falling within any of these categories and these variables were tested as potential correlates of services use along with the political violence category.

We examined the temporality of trauma exposure, immigration, and diagnosis (examined which came first) to better understand patterns and timing of these events as reported by the respondents. Although we may make an assumption that political violence occurs before immigration and that psychiatric need occurs as a consequence, we believe that patterns may vary lending to our further understanding of the complexity of trauma among immigrants. Immigrants can be at risk for community violence and trauma here in the US as well as have pre-existing psychiatric disorders before the PV and before immigration (Netland, 2001; Rousseau & Drapeau, 2004).

Circumstances of Exit (Migration/Immigration)—A battery of questions examining the experience of immigration or exit from their own country was asked of all immigrants.

Questions included degree of choice to leave (*had to leave* or *did not have to leave*), planning of move, frequency and difficulty of returning home and visiting relatives, and satisfaction with opportunities in the U.S. These questions were asked in order to understand the context of immigration and its potential impact on perceived need for mental health services use since immigration is a known psychosocial stressor (Hjern, Angel, & Jeppson, 1998).

Psychiatric Diagnoses—We examined specific categories of DSM-IV diagnoses which commonly present within medical and mental health services. We also included a variable which represents the total number of lifetime diagnoses for each respondent which serves as a proxy for severity of psychiatric history in our regression models and has been found to be valid and useful for this purpose in other psychiatric epidemiology studies (Alegria et al., 2004; Kessler & Zhao, 1999).

Diagnostic measures for lifetime and last-12-months prevalence of psychiatric disorders of interest were obtained using the diagnostic interview of the World Mental Health Survey Initiative version of the World Health Organization Composite International Diagnostic Interview (WMH-CIDI; Kessler & Ustun, 2004). The WMH-CIDI is a fully structured diagnostic instrument administered by trained lay interviewers that is based on criteria of the Diagnostic and Statistics Manual of Mental Disorders, Version 4 (DSM-IV) and ICD-10 symptom criteria. We examined rates of *any lifetime depressive disorders* (Dysthymia, Major Depression), *anxiety disorders* (Post Traumatic Stress Disorder, Agoraphobia, Generalized Anxiety Disorder, Panic Disorder, and Social Phobia) or *substance disorders* (inclusive of alcohol and drug abuse/dependence). We examined psychiatric disorders in our models as they were expected to be likely correlates of mental health services use. Although we had intended to use last-12-months prevalence of psychiatric disorders in predicting last-12-months service use we found the rare occurrence of disorders made our regression models unstable and thus we use lifetime psychiatric disorders to predict both lifetime service use and last-12-months service use.

Chronic illness: We included a dichotomous variable to represent the reported prevalence of any one of the following major chronic medical conditions: asthma, diabetes, cancer, or cardiovascular disease. This variable was included for three reasons. First, the presence of chronic illness is a factor which is related to use of health services and therefore could serve as a vehicle for entry into mental health services for immigrants. Second, physical illness complaints may be a more common presentation for trauma exposed immigrants as compared to mental health symptoms. Third, the presence or exacerbation of a chronic illness may be related to exposure to trauma and other severe psychosocial stressors (Chiriboga, et al, 2002; Diaz, et al, 2001; Gannotti, et al, 2004; Ortega, et al, 2006; Robison et al., 2003).

Social support, social stressor and neighborhood safety in the United States—In addition to demographic (e.g., age, sex, marital status) and socioeconomic (e.g., education, income) correlates, we also included several sociocultural measures aimed at capturing family-based social supports as well as social stressors potentially important to Latino immigrant populations in their adjustments in the United States and important to their mental health (Alegria et al, 2004).

The *Family Support* measure is constructed by assessing 1) the frequency (less than once a month to most every day) of talking on the phone or getting together with family or relatives who do not live with you; 2) degree (not at all to a lot) of relying on relatives who do not live with you for help if you have a serious problem; and 3) degree of opening up to relatives who do not live with you if you need to talk about your worries. This three item scale has a standardized Cronbach's alpha of 0.71 for the entire Latino sample. The maximum and

minimum scores for the sample are 15 and 5 respectively, with higher values indicating greater support.

Everyday Discrimination measures the frequency of routine occurrence of unfair treatment, including experiencing situations such as being treated with less respect than other people, having people act as if they were afraid of them and being called names or insulted. These nine items were taken from the Detroit Area Study (DAS; Jackson & Williams, 1995; Williams, et al, 1997). Higher scores represent more incidences of everyday discrimination as compared to lower scores. The minimum and maximum scores for the scale are 9 and 54, respectively, with a standardized Cronbach alpha of 0.91.

The *Acculturative Distress* scale items were taken from the Mexican American Prevalence and Services Survey (MAPSS) (Vega et al, 1998) with additional items developed by NLAAS researchers to be inclusive of other Latino ethnic groups. This scale measures the stress of cultural change that results from immigrating to the United States (Cervantes, Padilla, & Salgado de Snyder, 1990, 1991). It includes stressors such as language barriers, loss of family ties, perceived prejudice related to ethnicity and legal status, and occupational stress. The instrument has a Cronbach's alpha of 0.70 in our sample and the maximum and minimum scores are 0 (all negative responses) and 10 (all positive responses). Sample questions include: 1) Do you feel guilty for leaving family or friends in your country of origin?; 2) Do you feel that living out of your country of origin has limited your contact with family or friends?; 3) Have you been questioned about your legal status?; and 4) Do you avoid seeking health services due to fear of immigration officials? Higher scores on this continuously constructed scale indicate higher feelings of acculturative distress.

The Neighborhood Safety scale uses three items to measure the respondent's perceived level of neighborhood safety and neighborhood violence. Respondents are asked to rate various statements regarding their neighborhood (e.g., whether people use drugs or if people are often mugged or attacked). The items were modified from the National Longitudinal Study of Adolescent Health (Add Health; Bearman, 1997) and the 1994 NIMH multi-site project, "Cooperative Agreement for a Multi-Site Study of Mental Health Service Use, Need, Outcomes, and Costs in Child and Adolescent Populations." The instrument has a Cronbach's alpha of 0.76. Higher scores indicate a greater degree of neighborhood safety than lower scores. Representative Items*:* "I feel safe being out alone in my neighborhood during the night." "People often get mugged, robbed or attacked in my neighborhood." The 4 response categories range on a Likert scale from Very true (1) to Not at all true (4). Minimum and maximum scores are 3 and 12 respectively. This variable was included as a measure of respondents' sense of safety in their current environments which if low can represent the potential for further traumatization, ongoing anxiety and other symptoms which may lead to help seeking (Cohen, Berliner, & Mannarino, 2003; Elliot, Quinless, & Parietti, 2000; Kessler, 2000).

Perceived need for services—Lifetime perceived need for services, specifically for mental heath and substance problems, is evaluated by a question in the NLAAS service core which reads as follows: "At any time in your life did you think that you should talk to a medical doctor or other health professional about problems with your emotions, nerves, mental health, or your use of alcohol or drugs (yes/no)?" Perceived need was included as this is one factor which can be greatly influenced by culture and context while also being closely related to help seeking (Diaz, et al, 2001; Gannotti, et al, 2004; Robles, et al, 1985; Wells, et al, 2001).

Sociodemographic and Subethnicity Factors—Self-reported *sociodemographic* variables included in the analysis were: Latino subgroup categories which include Mexican, Puerto Rican, Cuban, Other Latino (i.e., Central American, South American and Caribbean categories which do not correspond to one of the other larger groups), sex, age, education (less

than high school, high school, college, beyond college), marital status (married vs. single/separated/divorced/widowed), personal income, language proficiency in English (good / excellent vs. poor/fair), any insurance either public or private (yes/no), and citizenship status (yes/no). These factors vary by immigrant group and have been associated with variations in health service use and access (Pew Hispanic Center & Kaiser Family Foundation, 2004).We also wanted to pay attention to the effects of gender as we expected that men are more likely to be exposed to PV, and that they will vary in their exposures to different types of other psychosocial stressors and trauma and may vary significantly in their pattern of service use based on gender specific social norms (e.g. help seeking) and barriers (work schedule patterns).

Dependent variable: Lifetime and Last 12 month mental health service use— Rates of any lifetime and last 12 month mental health service use were estimated from the NLAAS service use module. Any mental health service use was defined broadly in order to capture any attempt at receiving mental health services. Services include receiving mental health care from a specialty provider, a primary care provider, any health provider, or human service and spiritual providers (social workers, priest, rabbi, and spiritualist) for a mental health problem. Participants were asked specifically if they had ever in their lifetime seen one of the above types of professional for problems with emotions or nerves or their use of alcohol or drugs.

Statistical Analyses

Descriptive and inferential analyses were conducted using SAS 9.1 (SAS Institute Inc., Cary, NC). All analyses were weighted in order to account for the study sampling design including the intentional over sampling of some subgroups, thus results presented are national estimates. First, we estimate the weighted prevalence of exposure to political violence for immigrant Latinos in the United States. Then we compare immigrant Latinos exposed to PV to immigrant Latinos not exposed to PV on descriptive variables of interest, and age- and gender-adjusted immigration circumstances using chi-square tests. Because Cubans comprise the greater part of those exposed to PV and we expected them to have higher socioeconomic and social status as compared to other Latino groups, we compare immigrant Cubans with PV exposure to other immigrant non-Cuban Latinos with PV exposure on sociodemographic variables using chi-square tests.

Next, we examined the correlates of last 12-month and any lifetime mental health services use for immigrant Latinos exposed to PV using multi-staged logistic regression models. Because the rate of PV for island born Puerto Ricans is lower than for other subethnicities, we designated this as the reference group in our regression analyses. We start with models including only demographic variables, then sequentially add variables pertaining to history of traumas experienced, immigration circumstances, potential stressors in the United States., and finally, disorders and perceived need for services. This multi-stage analysis allows us to examine factors from traumatic exposure to social adjustment one at a time. Psychiatric status and perceived need were expected to be the strongest predictors of service use in the context of other stressors and were added last to examine their effect on the other coefficients. For the regression analyses, we report odds ratios and 95% confidence intervals.

RESULTS

Prevalence and descriptive results

To better understand circumstances of PV in Latin America, we provide a summary of political climate and immigration patterns (López & Carrillo, 2001; Suárez-Orozco & Paez, 2002; U.S. Department of State, 2006) in Table 1 for some of the countries with the highest percentage of individuals reporting political violence exposure in our study. Civil war, poverty, and

government repression are some of the social, political and historical contexts among these groups. Refugee status and displacement are part of the immigration and political violence context. Our descriptive results show that Cuba, El Salvador, Mexico, Columbia, and Nicaragua are among the countries with higher rates of exposed individuals among our immigrant sample (see Figure 1).

Timing of PV exposure, immigration and onset of psychiatric disorder—Weighted results indicate that 11% of immigrant Latinos in the US report a history of PV. Victims of PV are more than twice more likely to be immigrants than US born Latinos (7.59% vs. 3.18%, p <.001; data not shown). In regards to the timing and ordering of events, 78% of immigrants with PV reported experiencing the political violence before immigration. The onset of any diagnosis (depression, anxiety, alcohol or drug abuse or dependence) occurred more often after PV exposure than before: 11% of individuals reported the onset of any one of these diagnoses before the PV exposure while 21% of individuals described the onset after the exposure (data not shown).

Characteristics of the total sample of Latinos compared to characteristics of immigrants exposed and not exposed to political violence—Table 2 shows the results of comparisons among the three groups weighted by age and gender: the total US Latino population (both immigrant and non immigrant) as a point of reference against the PV exposed Latino immigrants and non-PV exposed Latino immigrants. Immigrants in the youngest age category were less likely to be exposed to political violence (36% exposed vs. 48% not exposed, $p < .01$), while middle-aged immigrants had higher levels of exposure (21% exposed vs. 13% not exposed, $p < .01$). Immigrants who report PV exposure are more likely to be male (50% vs. 38% female, $p < .01$). Fewer island born Puerto Ricans (5%) reported PV exposure compared to other Latino sub-ethnicities, but within those sub-ethnicities, Cubans (24% exposed vs. 4% not exposed, $p < .001$) and Other Latinos (59% exposed vs. 26% not exposed, $p < .001$) were more likely to report PV exposure, while Mexicans (13% exposed vs. 62% not exposed, $p< .001$) were less likely. PV exposed Latino immigrants in the U.S. tend to have high educational levels (college graduates 40% exposed vs. 18% not exposed, $p < .001$; graduate school 11% exposed vs. 3% not exposed, $p < .001$). Immigrants in the lowest income category were less likely to be exposed to PV (42% exposed vs. 56% not exposed, $p < .001$) while immigrants in the highest income category were more likely to be exposed (5% exposed vs. 1% not exposed, $p < .01$). PV exposed immigrants are also more likely to have health insurance (78% exposed vs. 54% not exposed, $p < .001$), to report better English language proficiency than non-exposed counterparts (41% vs. 24%, $p < .001$) and more likely to have attained citizenship status (44% vs 33%, $p < .05$). There is no significant difference in prevalence of DSM-IV depressive or anxiety disorders in particular, nor any greater odds of lifetime psychiatric disorder between PV exposed and non-exposed immigrant Latinos. However, there is a trend for higher rates of substance disorders among PV exposed immigrants approaching significance (9% exposed vs. 5% not exposed, $p< .06$). PV exposed immigrants are more likely to perceive need for mental health services (18% exposed vs. 11% not exposed, $p < .05$) and report lifetime service use compared to those not exposed (33% vs. 22%, $p < .01$). They are also more likely to suffer from a chronic medical illness (asthma, diabetes, cancer or cardiovascular disease; 33% exposed vs. 25% not exposed, $p < .05$) than those not exposed.

Given the high rates of political violence exposure for Cuban sub-ethnicity, demographic differences were further broken down by Cubans and non-Cuban immigrants (data not shown). As compared to Cubans, Non-Cubans with PV tend to be in the youngest age category (18-34 years (39% non-Cuban exposed compared to 28% Cuban exposed, $p < .05$), the lowest educational category (11 years or less: 33% non-Cuban exposed compared to 25% Cuban exposed, $p < .05$), and more likely to be working poor (income category $15,000-$34,999: 41% non-Cuban exposed compared to 29% Cuban exposed, $p < .05$). Cubans are more likely

to report chronic illness (48% Cuban exposed compared to 29% non-Cuban exposed, $p < .01$). These results emphasize how the correlates change among the immigrants exposed to PV depending on the subethnicity.

Comparison of immigration circumstances for immigrant Latinos exposed or not exposed to political trauma—Results in Table 3 contrast the context of exit circumstances between PV and non PV exposed immigrant Latinos. Respondents who report exposure to political violence also indicate: a lower frequency of returning to their country of origin; a greater frequency of "having to" move rather than moving because they "wanted to" that political violence was a "very important" factor in their decision to move; a greater difficulty in visiting their relatives; and being older, on average, when they left their country of origin.

Other lifetime traumatic experience—Results also show that among those reporting political violence, there is frequent representation of other lifetime experienced traumas. Seventy-six percent (76%) of Latino immigrants with a history of political violence have also experienced other traumatic events including personal, physical, and sexual assaults, witnessing the death of a loved one, and/or witnessing community violence. The traumatic events most often reported were death of a loved one or seeing someone dead (38% and 44% respectively), followed by being threatened by someone with a weapon (35%), and being molested (14%). Compared to non-Cubans, Cubans were less likely to report multiple traumas (2.04 traumas, on average, reported for non-Cubans compared to 1.36 for Cubans, $p < .001$). We also found significant gender differences in types of other trauma reported, i.e., as would be expected. Women were more likely to report rape (20% vs. 5%; $\chi^2 = 18.10$, df=1, $p<.0001$) and domestic violence (7% vs. 1%; $\chi^2 = 36.22$, df=1, $p<.0001$), while men were more likely to report kidnapping (7% vs. 1%; $\chi^2 = 19.73$, df=1, $p<.0001$), having been threatened with a weapon (43% vs. 22%; $\chi^2 = 11.71$, df=1, $p<.001$), and witnessing carnage (12% vs. 3%; $\chi^2 = 3.74$, df=1, $p<.05$).

Correlates of last 12 months and any lifetime mental health service use—Table 4 and Table 5 demonstrate the results of five-staged logistic regression models examining correlates of last 12 months and any lifetime mental health service use among immigrant Latinos with PV exposure. Higher education and higher income are significant negative correlates of last 12-month mental health service use among immigrants exposed to PV while having insurance is a positive correlate. Immigrants with perceived need for services were more likely to report both last 12 months use and lifetime service use than those without perceived need.

Cuban sub-ethnicity was also associated with decreased likelihood of 12-months service use as compared to Puerto Ricans. In terms of associated trauma, experiencing loss or threat to a loved one was associated with decreased likelihood of service use while witnessing community violence was associated with increased likelihood of service use. Having a chronic illness was associated with six times the likelihood of using services, while having perceived need (OR=12.99, CI=3.9, 42.9) and an anxiety disorder (OR=39.07, CI= 6.1, 249.1) were by far the strongest correlates of mental health services use in the past year.

Being of Mexican ethnicity, as compared to Puerto Rican, was associated with reduced odds of lifetime service use. Acculturative stress was significantly associated with lifetime mental health service use only before adjusting for lifetime psychiatric disorders and perceived need for mental health care. However, higher self report of everyday discrimination experiences was associated with an increased likelihood of mental health service use. In our final model for lifetime service use we found that female gender, experiencing personal assaults (and not so for witnessing or experiencing the deaths of others), and having substance disorder (not

depressive disorders or anxiety disorders) were associated with an increased likelihood of using any mental health services. Similar to 12-month service use, having a college degree or higher was associated with a decreased likelihood of any lifetime mental health service use among immigrant Latinos with PV.

DISCUSSION

Prevalence and potential impact of political violence exposure

This study examines the prevalence of political violence and considers the influence of sub-ethnicity, socioeconomic, environmental, and psychosocial context on mental health service use among Latino immigrants in the United States. To our knowledge, this is the first study to examine the prevalence of political violence in a nationally representative sample of Latinos. Our findings suggest that political violence is prevalent (11%) in Latino immigrants in the United States. However, the prevalence rate is much lower than reported in previous studies using clinical samples. For example, Eisenman and colleagues (2003) found that among Latino immigrant patients in their study of Los Angeles primary care centers, 54% of patients sampled reported a history of exposure to political violence. The fact that ours is a non-clinical, community based sample likely contributes to the lower prevalence of PV found in this study. It is also likely that impairments in mental and physical health concentrate individuals with a history of PV in primary care settings, making such settings prime for screening and intervention.

We were surprised to find no significant differences in rates of mental health disorders when comparing immigrants exposed to political violence vs. those not exposed or to US Latinos in general. We expected higher prevalence rates of psychiatric disorders like PTSD and depression, given the severe trauma and displacement experienced by many PV exposed immigrants. Recent studies by Alegria et al (in press) have shown that the processes of acculturation, immigration factors, family stressors and supports, social status and other contextual factors can all impact on rates of psychiatric illness. These factors influence rates of disorder which vary by Latino subethnicity in the United States. Examining predictors of PTSD and other psychiatric illness after PV exposure in community samples of immigrants is beyond the scope of this paper but a logical next step for understanding rates of disorder as well as risk and protective factors.

As expected, we found that political violence was more common among immigrants and that the onset of any DSM-IV diagnosis among this population was more likely to be reported as occurring after PV exposure. However, PV exposed immigrants who report the onset of at least one DSM-IV diagnosis are just as likely to report this onset as occurring before immigration as compared to after immigration. This could be at least partially related to the fact that when we examined patterns of age at PV exposure, immigration, and diagnosis onset, it was not uncommon for all three of these events to occur very close in time and often within the same year. This suggests the importance of providing supports and outreach to recently immigrated Latinos, especially in communities arriving from countries with known political turmoil and violence.

Although we did not find higher rates of psychiatric disorder among PV exposed immigrants as compared to those without such history, there is evidence of distress. We found that individuals exposed to political violence are more likely to report perceived need for mental health services and to feel that they should talk to a medical doctor or other health professional about problems with their emotions, nerves, mental health, or use of alcohol or drugs. They are also more likely to suffer from chronic medical illnesses. The combination of perceiving need, worse physical health and higher rates of psychiatric disorder within clinical samples noted in the literature still calls for addressing the needs of this population more effectively

when they do present to the healthcare system. However, we find that Latinos with exposure to political violence are relatively unlikely to use any mental health services. This may be in contrast to perceptions that immigrants come to the United States in order to use services including the health care system. For this reason, the rest of this discussion looks further at the social, environmental, and cultural factors that may influence PV exposed immigrant Latinos' presentation to mental health services.

Nationality, Ethnicity, Social Context and Mental Health Services Needs and Use

Nationality and ethnicity were important to our findings and suggest some important considerations for understanding variability in political violence experiences, social status and mental health services use among Latino immigrants. The "Other Latino" subgroup in our study (which includes Bolivians, Nicaraguans, Salvadorians and Colombians among others) as well as Cuban immigrants (exiles with political refugee status) includes nationalities with a high prevalence of PV. These populations clearly come from nations where recent political unrest, coups and civil war have been influential in the recent history, immigration, and displacement of communities. There is also variability in the current social context of these immigrant populations here in the United States and these differences may influence patterns of services use and need for services in specific Latino subgroups.

Cubans are one of the groups reporting relatively high rates of exposure to political violence. As expected, the primary type of political violence reported by Cubans in the US relates to being a refugee or political exile. The initial Cuban exile began in the 1950s and the Mariel Boatlift occurred in the 1980s which likely explain why our PV exposed Cuban immigrant population is older than the other Latinos in our sample. In addition, many Cubans were older when they first immigrated. Because Cubans with PV exposure who are over 65 years of age are over a quarter of that sample, there may be important patterns of need for this group. First, they are more likely to suffer from chronic health conditions as compared to other Latinos with PV exposure and so this may be an important presentation in primary care. Although our results suggest that political violence most likely occurs in the context of other multiple traumatic experiences, we found that Cubans were less likely to be exposed to personal assault or multiple trauma as compared to non-Cubans with PV. Thus, the patterns of services use for this population may be more likely associated with chronic illness and less so with multiple traumas although both should be considered in the clinical setting.

Mexicans and Other Latino groups exposed to political violence were less likely to use any mental health services (lifetime or last 12 months) and more likely to be poor (in the lower income ranges) as compared to Puerto Ricans. This is a relatively younger generation of immigrants as compared to the Cuban exiles in our sample. Immigrants have come to the US from El Salvador throughout the 1900s, with a significant increase in displacement as a result of the civil war that lasted from 1979 to 1992. Immigrants from El Salvador have experienced severe trauma and psychosocial consequences of PV and immigration (Martin-Baro & Canas, 1989). We need to consider the multiple barriers to care (language, income, insurance, legal status) for these populations from countries with known political turmoil and violence but who may have limited access and use of mental health services here in the US. Several studies have clearly demonstrated relatively low use of health services among immigrants (Eisenman, et al, 2003; Stein et al., 2003; Wells, et al, 2001). It is important to note that our definition of mental health services was broad and included social workers and physicians as well as traditional healers. Yet, many Latinos from these war torn countries are still less likely to use any of these services for mental health reasons when compared to Puerto Ricans and other US Latinos.

The influence of educational level on service use among political violence exposed Latinos presents an opportunity to consider a potential protective factor for mental health. Our findings suggest that having a college degree or higher reduce the likelihood that individuals with

exposure to political violence have used any services, including mental health services. One might expect that higher education improves access to service because of the association with financial access and knowledge regarding resources among the more educated. However, it is quite possible that having more education provides protection from distress and mental health consequences through enhanced social status, resources, and benefits in the US. Education can empower individuals and communities which may help buffer the emotional consequences of political violence and immigration (Ailinger, Dear, & Holley-Wilcox, 1993; Texidor del Portillo, 1987).

Given the social, political, and economic contexts of immigrants from Latin American, many have experienced severe discrimination in their countries of origin and continue to do so here in the US (Finch et al, 2000; 2003). A history of severe distress can contribute to this heightened perception of discrimination and in turn high levels of perceived everyday discrimination has been found to be correlated with poorer health outcomes (Caputo, 2003; Finch, Kolody, & Vega, 2000; Ryff, Keyes, & Hughes, 2003; Szalacha et al., 2003). In our sample of immigrant Latinos with a history of PV, everyday discrimination was associated with service use in the last 12 months and may suggest the additive affect of this significant stressor when living in the United States.

We did not a find a relationship between family support and use of services. Previous studies have found that family support can be protective for mental health conditions but also may result in delaying use of services (Pescosolido & Wright, 2004; Stein et al., 2003). In contrast, experiencing acculturative stress is associated with an increased likelihood of use of services in our sample, a result that changed only after controlling for psychiatric disorders and perceived need. Both acculturative stress and perceived need are likely influenced by family and other social support. In fact, immigrants with political violence in our sample demonstrated a pattern of relatively high family support and low acculturative stress as compared to immigrants not exposed. Family support may be a critical source of support especially in the context of shared experiences of trauma. The role of family may also vary depending on the type of traumas experienced by this population. For example, we found that loss of a loved one is associated with less likelihood of using services in contrast to community violence which is associated with more use of services and may suggest that families may be able to provide a better buffer or support for things closer to the family context. In contrast, community violence may trigger anxiety regarding threatening and uncontrollable environments reminiscent of countries in political turmoil.

Gender: Men as particularly underserved population

The fact that PV exposed immigrant men were less likely to report service use underscores an important subpopulation which may be particularly underserved in regards to mental health supports. Studies have shown that Latino men face multiple barriers to accessing mental health services which include usual factors such as lack of health insurance, income, work schedules, legal status, and language (Bauer, Rodriguez, Quiroga, & Flores-Ortiz, 2000; Escobar & Nervi, 2000). In addition, stigma around mental health, emotional vulnerability, and challenges to masculinity may also play a part (Addis & Mahalik, 2003; McVittie & Willock, 2006). Some studies have also suggested that Latino men may have starkly different perceptions of mental health and need for services and thus present much later in the course of their illness than their female counterparts (Caputo, 2003; Finch, Kolody, & Vega, 2000; Ryff, Keyes, & Hughes, 2003; Szalacha et al., 2003). Latino immigrant men with a history of PV demonstrate a pattern of trauma exposure which makes their not accessing services particularly concerning. For one, they have a higher rate of exposure to political violence than their female counterparts. Secondly, there are certain other traumatic exposures which men endorsed more in this study, including severe violent experiences. Because perception of need is such a strong correlate of

any mental health service use (lifetime and last 12 months) in our study, it would seem reasonable to consider this an important area of community outreach and education for both Latino men from subpopulations with a high rate of political violence exposure and their providers.

Patterns of services in the past year vs. lifetime use

Importantly, meeting criteria for some DSM-IV diagnoses did increase the likelihood of using mental health services. Anxiety disorders were correlated with mental health services use specifically in last 12 months services use. Anxiety disorders include Post Traumatic Stress Disorder and other disorders highly correlated with a history of trauma. In addition, individuals exposed to personal assault, as compared to other types of trauma, were also more likely to present to services in the past 12 months and such exposures are likely part of the presentation with PTSD or ongoing stressors. It is also important to consider that having a chronic illness was associated with seven times the likelihood of using services for mental health concerns in the past 12 months and points to the idea that medical illness (somatic complaints) may be an important presentation with or without clearly reported anxiety or other psychiatric symptoms. Similarly, having a substance disorder is associated with an increased likelihood of using any mental health services over a lifetime. Given the trend for substance disorders among PV exposed immigrants, this suggests another important indicator of mental health and services need for this population over time.

Limitations

The cross-sectional nature of our data limits a discussion of causal relationships. In addition, we were unable to include DSM-IV diagnoses present in the past 12 months as potential correlates due to the relatively low prevalence of these disorders in the sample. In addition, our description of the timing of PV exposure, immigration and onset of diagnoses symptoms is useful in illuminating some of the patterns of experienced trauma relative to immigration and onset of diagnoses but cannot provide causal evidence. A comprehensive analysis of timing of single and multiple traumas relative to onset of symptoms would be useful in future work for the determination of trauma risk among immigrants, but is beyond the scope of this paper.

Clinical Implications

Clinicians, researchers, and policy makers should further consider the diversity of political violence traumatic experiences and immigration contexts among immigrant Latinos entering the US and the specific impact these issues may have on the mental health and services needs for these populations. Based on the results, political violence among Latino immigrants is prevalent. But experiences of political violence are diversely represented among immigrant subgroups and across a variety of ethnicities, ages, and generations, for men and women in their specific contexts. Addressing perceptions of need in a diversity of Latino communities (outreach and education campaigns) may be among the most important of intervention strategies. There is also a need for understanding other health services access barriers among specific subgroups (men, certain ethnic groups). This includes research examining the best methods and settings for delivery of psycho-education, support and treatment. As healthcare providers, we need to be mindful that Latinos may have immigrated to the US for a variety of reasons, not only for economic opportunity but also to escape political turmoil in their native countries, thus carrying the burden of related trauma in addition to the stresses of migration. In addition, other related traumas, their impact, and the role of community and family in coping with these varied experiences are important issues to consider in planning and developing support interventions for this population. Researchers have begun to consider strategies for clinical screening and the delivery of brief treatments for conditions like PTSD in primary care settings for other populations. Such interventions combined with an understanding of the

cultural and family context of immigrants may be among the clinical strategies developed for addressing the needs of this population especially among the recently immigrated and those from countries with significant political turmoil.

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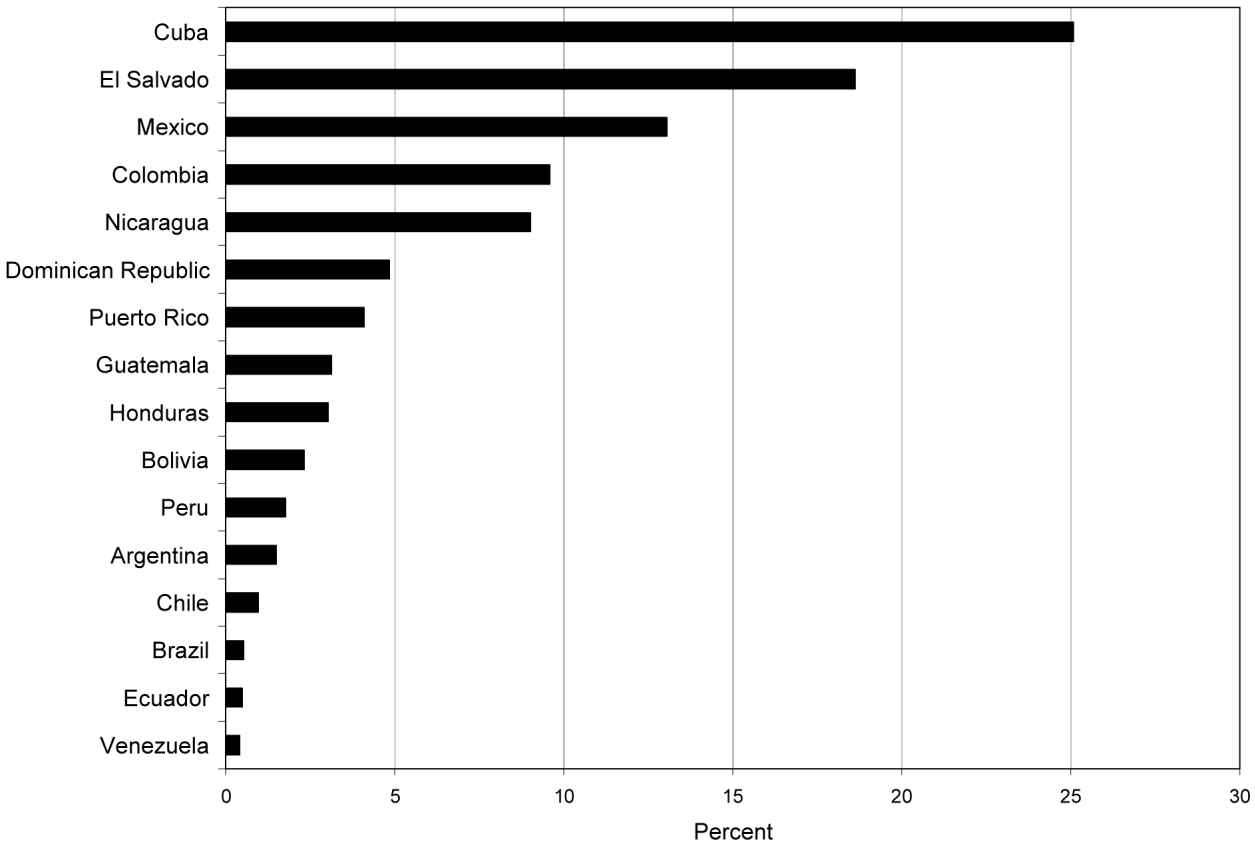

Figure 1.
Exposure to Political Violence for Immigrants by Latin American Countries of Origin

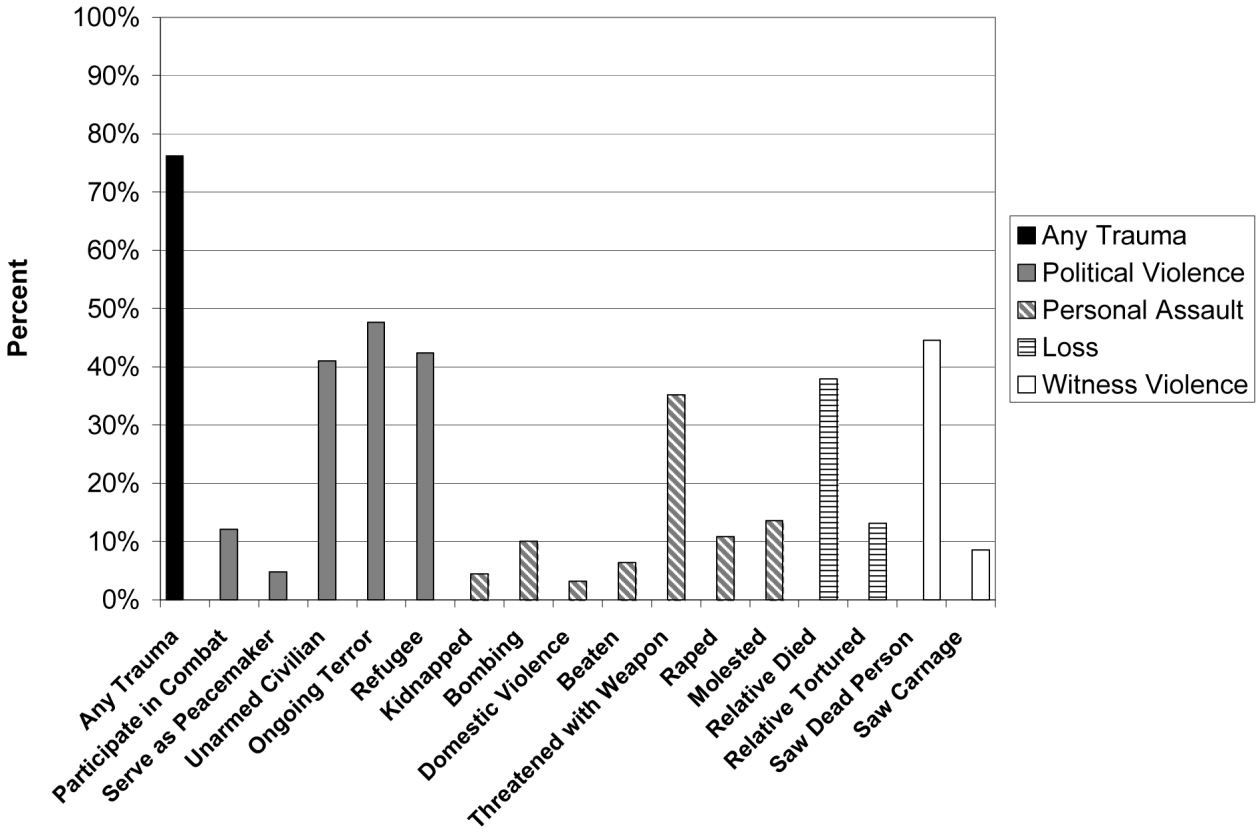

Figure 2.
Weighted cumulative percent and types of other reported lifetime traumas among immigrants with political violence exposure

Table 1

Political and immigration context of political violence among Latino nationalities

	Types of Political Trauma	Migration/Immigration Patterns
Colombia	Colombia has had guerrilla activity since the 1940s and high rates of homicides, drug trafficking	Peak migration to U.S. in 1980s, Colombia recently allowed dual citizenship
Cuba	Castro's dictatorship and three massive waves of refugees to US	Waves of immigration have occurred after Castro came to power, first wave of affluent and highly educated, second wave of middle class, and third wave of working class
Dominican Republic	Rafael Trujillo dictator for 31 years; large immigrant population from Haiti.	Movements back and forth from homeland to U.S. have occurred primarily for economic reasons resulting in settlement enclaves in US with high levels of poverty and unemployment
El Salvador	Civil war from 1979 to 1992, government repression of opposition through torture and murder, disappearances, rightist and leftists groups accelerating violence; Salvadoran armed forces engaged in lawlessness ; large number of refugees. Honduras and El Salvador fought over borders; a peace treaty was signed in 1980, but it was not until 1992 that the land in dispute was awarded to Honduras.	Immigration occurred throughout the 1900s with significant increases during the civil war with many undocumented immigrants seeking political asylum
Mexico	In the state of Chiapas, there has been no combat between government and guerrilla forces since 1994, aside from the occasional small skirmish. However, the conflict remains unresolved even though the Congress passed an indigenous rights law in 2001.	Movement back and forth from homeland to U.S. has been primarily for economic reasons. Both migrant workers and long term well established generations of Mexican Americans present especially in the Southwest.
Nicaragua	Sandinista National Liberation Front came to power in 1979. Protracted and bloody civil war ensued from 1981 to 1990 that claimed the lives of 60,000 persons or 1.5% of the population.	Civil war directly affected 15% of the population; resulting in internal displacement of 350,000 and an external exodus of 250,000 refugees.
Peru	The country is based on a representative democracy. Although a violent guerrilla war that was conducted by two Maoist and Marxist groups has diminished, the country still has political and economic difficulty.	Peru has had less immigration than other northern parts of South America and immigration has diminished since 1984. However the number of non-citizens has been increasing by approximately 4,000 a year.
Guatemala	Since the defeat of the flourishing Mayan civilization by the Spanish in 1523-24 the country's history has been turbulent with a series of dictatorships after independence in 1821 (violence, a failing economy, strikes, corruption, infant mortality, illiteracy, and low quality of health care). In 1990 Jorge Serrano was elected in the 1st democratic transition. An agreement on dialogue was signed in Oslo with the hope of ending one of the oldest insurgencies in the world. The indigenous people historically have been excluded from the mainstream of social, economic, and political activity.	Current movement includes back and forth migration from homeland to US, primarily for economic reasons and migrant work.
Puerto Rico	Military service experiences are the primary type of political violence exposure.	U.S. citizenship status characterized as "revolving door migration"

Table 2

Characteristics of the full sample of US Latinos compared to characteristics of immigrants exposed and not exposed to political violence

		Latino Immigrants	
weighted	All US Latinos %	Exposed to Political Violence %	Not exposed to Political violence %
Age Category			
18–34 years	49.01	35.99**	48.10
35–49 years	30.07	33.76	32.41
50–64 years	13.38	20.78**	13.38
65 years or more	7.55	9.47	6.12
Gender			
Female	48.50	37.81**	50.06
Ethnicity			
Puerto Rican	10.05	4.80	7.64
Cuban	4.63	23.67***	3.50
Mexican	56.63	12.86***	62.39
Other Latinos	28.69	58.67***	26.47
Education			
11 years or less	44.09	31.11***	58.37
12 years	24.47	18.11	20.25
13–16 years	26.73	39.84***	18.02
17 years or more	4.71	10.93***	3.37
Personal Income			
$0–$14,999	51.48	41.82***	56.02
$15,000–$34,999	32.92	38.46	32.44
$35,000–$74,999	13.65	14.90	10.13
$75,000+	1.96	4.82**	1.41
Any Insurance			
Yes	65.64	77.53***	54.22
Language Proficiency in English			
Poor/Fair	48.11	58.78***	76.09
Good/Excellent	51.89	41.22***	23.91
Marital Status			
Married	51.74	59.35	56.52
Never Married	29.97	21.29	26.09
Widow/Separated/Divorced	18.29	19.36	17.39
US Citizenship			
US Citizen	62.29	43.77*	32.54
Chronic Illness ±			
Reported asthma, diabetes, cancer, or cardiovascular disease	27.86	33.12*	24.58
Lifetime DSM-IV Disorder			
Any DSM-IV Disorder	30.40	27.75	24.38
Any Depressive D/O	15.47	15.66	13.88
Any Anxiety D/O	15.58	14.66	13.92
Any Substance D/O	11.24	8.76	5.23
Perceived Need of Services	15.58	17.66*	11.46
Any Service Use Lifetime	28.96	33.14**	21.78
Any Service Use Last 12 Months	11.41	11.74	8.42
Support and Distress Scales	Mean (range)	Mean (range)	Mean (range)
Family or Relative Support	11.60 (5, 15)	11.55 (5, 15)	11.37 (5, 15)
Acculturative Distress	N/A	2.66 (0, 10)	2.85 (0, 10)
Everyday Discrimination	16.39 (9, 54)	15.70 (9, 38)	14.87 (9, 54)
Perceived Neighborhood Safety	9.38 (3, 12)	9.61 (3, 12)	9.28 (3, 12)

Comparisons for immigrants with vs. without political violence

N/A, Acculturative Distress only asked of immigrants

* p<.05,

** p<.01,

*** p<.001

Table 3

Comparison of Exit Circumstances for Immigrant Latinos Exposed and Not Exposed to Political Violence

weighted	Exposed to Political Trauma	Not Exposed to Political Trauma
Frequency of returning to country of origin		
Often	12.36	15.59
Sometimes	23.03	31.74
Rarely	27.36	26.74
Never	37.25**	25.93
Reason for moving from country of origin		
Because you wanted to	41.34	73.36
Because you had to	58.66***	26.64
Description of move to the U.S.		
Carefully planned	33.02	30.75
Somewhat planned	22.10	26.27
Poorly planned	17.42	13.49
Not planned at all	27.46	29.50
How important was political violence in decision to move?		
Very important	67.41***	19.72
Somewhat important	9.18	12.31
Not at all important	23.40	67.97
How difficult is it to visit relatives in your country of origin?		
Very difficult	42.60***	27.16
Somewhat difficult	27.92	25.97
Not very difficult	8.15	14.77
Not at all difficult	18.04	30.05
No relatives to visit (N/A)	3.29	2.04
Satisfaction with economic opportunities in the U.S.		
Very satisfied	34.20	34.03
Satisfied	51.87	50.21
Neither satisfied or dissatisfied	10.68	11.69
Dissatisfied	3.16	3.08
Very Dissatisfied	0.08	0.99
Average age at departure from country of origin	22.50**	19.98

** p<.01;

*** p<.0001

Table 4

Series of Weighted Logistic Regressions Predicting Service Use in the Last 12 Months by immigrant Latinos Exposed to Political Violence (Odds Ratios and Confidence Intervals Presented)

Independent Variables	Model 1 Demographic Variables	Model 2 Add types of other traumas	Model 3 Add Immigrant Exit Circumst.	Model 4 Add social supports /stressors in US	Model 5 Add diagnosis and perceived need
Female	2.72* [1.06, 6.99]	2.93* [1.01, 8.48]	2.74* [1.08, 6.96]	2.55 [0.81, 7.96]	0.58 [0.11, 3.15]
Age 18-34	0.25 [0.03, 2.57]	0.32 [0.03, 3.35]	0.36 [0.30, 4.28]	0.16 [0.01, 2.65]	0.59 [0.05, 7.23]
35-49	2.97 [0.58, 15.15]	3.25 [0.70, 15.13]	4.30 [0.74, 24.82]	1.74 [0.33, 9.27]	6.94 [0.96, 50.25]
50-64	1.87 [0.37, 9.51]	2.27 [0.46, 11.21]	3.23 [0.49, 21.49]	2.81 [0.59, 13.32]	2.26 [0.28, 18.23]
65+	1	1	1	1	1
Puerto Rican	1	1	1	1	1
Cuban	0.20 [0.30, 1.36]	0.29 [0.04, 2.03]	0.19 [0.01, 2.83]	0.55 [0.06, 5.51]	0.07* [0.01, 0.84]
Mexican	0.33 [0.05, 2.34]	0.39 [0.06, 2.53]	0.31 [0.03, 3.00]	0.54 [0.04, 7.45]	0.13 [0.01, 2.43]
Other Latino	0.33 [0.05, 2.23]	0.41 [0.06, 2.75]	0.39 [0.04, 4.06]	0.70 [0.06, 8.14]	0.71 [0.07, 6.73]
Education College degree or more	0.30* [0.11, 0.77]	0.20** [0.06, 0.63]	0.18** [0.05, 0.63]	0.27* [0.08, 0.92]	0.07*** [0.02, 0.27]
Income Less than $15,000	1	1	1	1	1
$15,000-$34,999	0.38 [0.14, 1.05]	0.34 [0.11, 1.06]	0.30* [0.09, 0.98]	0.18* [0.04, 0.91]	0.46 [0.06, 3.70]
$35,000-$74,999	0.06** [0.01, 0.47]	0.05** [0.01, 0.32]	0.05** [0.01, 0.34]	0.05** [0.01, 0.41]	0.15 [0.01, 2.50]
$75,000+	0.11** [0.03, 0.43]	0.09** [0.02, 0.45]	0.07** [0.01, 0.44]	0.09** [0.02, 0.48]	0.06** [0.01, 0.41]
Insurance (yes)	16.08*** [4.30, 60.17]	17.73*** [4.45, 70.58]	20.33*** [4.68, 88.33]	21.13*** [6.64, 67.17]	23.91*** [5.60, 101.99]
English proficient	8.43*** [2.50, 28.35]	9.82*** [3.12, 30.86]	10.68** [2.62, 43.62]	20.13*** [3.85, 105.38]	10.47*** [3.14, 34.91]
Married	0.49 [0.20, 1.20]	0.44 [0.17, 1.14]	0.47 [0.19, 1.21]	0.70 [0.27, 1.86]	0.59 [0.14, 2.58]
Trauma Experience Personal Assault to self		1.31 [0.91, 1.89]	1.22 [0.84, 1.78]	1.24 [0.86, 1.78]	1.12 [0.74, 1.68]
Loss of /threat to loved one		0.76 [0.38, 1.49]	0.76 [0.35, 1.65]	0.68 [0.32, 1.44]	0.29* [0.09, 0.94]
Witness to community violence/carnage		1.69 [0.62, 4.64]	1.58 [0.58, 4.33]	1.90 [0.78, 4.62][0.38, 1.49][0.38, 1.49]	4.22** [1.76, 10.15]
Planned Exit (yes)			1.53 [0.45, 5.23]	2.10 [0.67, 6.58]	3.17 [0.68, 14.75]
Frequent Return to country of origin (yes)			1.42 [0.96, 2.12]	1.30 [0.89, 1.90]	1.88** [1.19, 2.98]

Independent Variables	Model 1 Demographic Variables	Model 2 Add types of other traumas	Model 3 Add Immigrant Exit Circumst.	Model 4 Add social supports /stressors in US	Model 5 Add diagnosis and perceived need
Family Support				0.94 [0.81, 1.08]	1.14 [0.89, 1.45]
Acculturative Stress				1.49** [1.11, 2.01]	1.14 [0.89, 1.45]
Everyday discrimination				1.02 [0.95, 1.11]	0.96 [0.88, 1.05]
Perceived Neighborhood Safety				1.04 [0.88, 1.23]	0.89 [0.73, 1.08]
Chronic Illness					6.18* [1.23, 31.08]
Number of lifetime diagnoses					0.73 [0.27, 1.94]
Any Depressive Disorder					3.24 [0.76, 13.83]
Any Anxiety Disorder					39.07*** [6.13, 249.14]
Any Substance Disorder					0.95 [0.08, 10.75]
Perceived Need (yes)					12.99*** [3.93, 42.97]

*** $p<.001$,

** $p<.01$,

* $p<.05$

Table 5

Series of Weighted Logistic Regressions of Any Lifetime Service Use for Immigrant Latinos Exposed to Political Violence (Odds Ratios and Confidence Intervals Presented)

Independent Variables	Model 1 Demographic Variables	Model 2 Add types of other traumas	Model 3 Add Immigrant Exit Circumst.	Model 4 Add social supports /stressors in US	Model 5 Add diagnosis and perceived need
Female	1.90 [0.96, 3.78]	2.09 [0.97, 4.54]	2.15 [0.98, 4.70]	2.79* [1.14, 6.78]	3.45* [1.31, 9.06]
Age 18-34	2.67 [0.67, 10.63]	2.76 [0.79, 9.62]	2.61 [0.74, 9.19]	0.98 [0.25, 3.86]	7.48** [2.18, 25.66]
35-49	8.54** [2.17, 33.56]	9.30*** [2.78, 31.16]	8.18*** [2.46, 27.17]	3.95* [1.16, 13.49]	16.08*** [6.58, 39.33]
50-64	3.33 0.82, 13.52]	3.13 [0.85, 11.48]	2.85 [0.82, 9.92]	2.00 [0.56, 7.08]	7.39** [2.19, 24.89]
65+	1	1	1	1	1
Puerto Rican	1	1	1	1	1
Cuban	0.23 [0.05, 1.15]	0.32 [0.06, 1.81]	0.41 [0.06, 2.75]	0.69 [0.08, 5.69]	1.20 [0.10, 14.55]
Mexican	0.12* [0.02, 0.77]	0.16 [0.02, 1.27]	0.18 [0.02, 1.40]	0.16 [0.02, 1.64]	0.09* [0.01, 0.96]
Other Latino	0.18* [0.04, 0.85]	0.22 [0.04, 1.10]	0.25 [0.04, 1.42]	0.32 [0.05, 2.29]	0.54 [0.06, 5.06]
Education College degree or more	0.35** [0.17, 0.72]	0.27** [0.12, 0.63]	0.27** [0.11, .064]	0.35* [0.15, 0.81]	0.32* [0.13, 0.80]
Income Less than $15,000	1	1	1	1	1
$15,000-$34,999	0.48* [0.24, 0.97]	0.49 [0.22, 1.05]	0.50 [0.23, 1.07]	0.49 [0.19, 1.29]	0.31* [0.10, 0.95]
$35,000-$74,999	0.21*** [0.09, 0.49]	0.18*** [0.07, 0.47]	0.19*** [0.07, 0.50]	0.24** [0.09, 0.62]	0.32* [0.13, 0.76]
$75,000+	0.15** [0.04, 0.53]	0.13** [0.03, 0.53]	0.14** [0.04, 0.54]	0.12** [0.03, 0.48]	0.16** [0.05, 0.52]
Insurance (yes)	3.91*** [1.75, 5.81]	3.62*** [1.99, 6.58]	3.65*** [2.15, 6.18]	3.73*** [1.79, 7.76]	8.23** [2.06, 32.78]
English proficient	2.50 [0.96, 6.51]	2.57 [0.88, 7.52]	2.69 [0.90, 8.03]	2.74 [0.91, 8.27]	1.81 [0.67, 4.86]
Married	0.99 [0.48, 2.02]	0.95 [0.49, 1.83]	0.91 [0.48, 1.72]	1.07 [0.56, 2.07]	0.66 [0.29, 1.50]
Trauma Experience Personal Assault to self		1.55** [1.15, 2.10]	1.58** [1.18, 2.13]	1.75*** [1.29, 2.37]	1.65** [1.17, 2.33]
Loss of /threat to loved one		1.33 [0.64, 2.76]	1.31 [0.62, 2.73]	0.98 [0.45, 2.14]	0.70 [0.32, 1.50]
Witness to community violence/carnage		1.04 [0.60, 1.81]	1.07 [0.61, 1.86]	1.02 [0.52, 1.98]	1.95* [1.06, 3.58]
Planned Exit (yes)			0.73 [0.38, 1.38]	0.93 [0.47, 1.86]	0.80 [0.39, 1.63]
Frequent Return to country of origin (yes)			0.89 [0.64, 1.25]	0.80 [0.56, 1.15]	0.85 [0.58, 1.24]

Independent Variables	Model 1 Demographic Variables	Model 2 Add types of other traumas	Model 3 Add Immigrant Exit Circumst.	Model 4 Add social supports /stressors in US	Model 5 Add diagnosis and perceived need
Family support Scale				1.08 [0.93, 1.25]	1.08 [0.91, 1.29]
Acculturative stress (scale)				1.19* [1.04, 1.37]	1.10 [0.90, 1.36]
Everyday discrimination (scale)				1.11*** [1.06, 1.16]	1.07* [1.00, 1.13]
Perceived Neighborhood Safety				1.04 [0.91, 1.20]	1.04 [0.87, 1.25]
Chronic Illness					1.84 [0.77, 4.40]
Number of lifetime diagnoses					1.00 [0.28, 3.52]
Any Depressive Disorder					4.31 [0.67, 27.86]
Any Anxiety Disorder					3.07 [0.37, 25.32]
Any Substance Disorder					24.44** [3.04, 196.60]
Perceived Need (yes)					11.07*** [4.47, 27.42]

*** $p<.001$

** $p<.01$

* $p<.05$