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## Using a Community-Engaged Approach to Develop a Bilingual Survey about Psychosocial Stressors among Individuals of Mexican Origin

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### Abstract

Hypertension is on the rise among Hispanics and is highest among those of Mexican origin. Recent studies have found a positive association between air pollution and blood pressure and hypertension. Moreover, a link between hypertension and adverse socioeconomic conditions is well established. However, less is known about psychosocial stressors, although their impact on coronary heart disease has been shown. To address this gap in the literature, community perspectives of the health consequences of environmental exposures and psychosocial stressors experienced among the Mexican-origin population in Houston, Texas were obtained through

participation in focus groups, the establishment of a Neighborhood Council of Advisors (NCA), and the testing of a pilot questionnaire. Taken together, the findings from the community were used to develop a culturally sensitive, bilingual questionnaire for an investigation of the combined effects of environmental and psychosocial stressors on hypertension among individuals of Mexican origin.

## Keywords

Psychosocial; stress; Hispanics; air pollution; hypertension; community; focus group

According to the U.S. Census Bureau, the Hispanic population is the fastest growing minority in the nation. In 2010, there were approximately 50.5 million Hispanics in the U.S., the largest increase being in the Mexican-origin population.<sup>1</sup> Among Hispanics, hypertension is on the rise and is highest among the Mexican-origin population,<sup>2,3</sup> with a prevalence that is now similar to that of non-Hispanic Whites.<sup>4,5</sup> This is especially important when one considers the morbidity and mortality associated with hypertension is greater among this population than among other ethnic/racial groups.<sup>2</sup> Unfortunately, cardiovascular disease (CVD) (which is associated with high blood pressure) remains the leading cause of death among U.S. Hispanics.<sup>6</sup>

Exposure to chemical and non-chemical stressors may increase risks for elevated blood pressure and hypertension. While not all findings have been positive,<sup>7</sup> other studies have found associations between outdoor air levels of particulate matter and blood pressure and hypertension for both short-term and long-term exposures.<sup>8–15</sup> For non-chemical stressors, the link between adverse socioeconomic conditions and hypertension is well established<sup>16</sup> and their impact on CVD has been extensively examined.<sup>17,18</sup> In addition to socioeconomic stress, other non-chemical stressors linked to hypertension include occupation-related stress, social isolation, and racial discrimination.<sup>19,20</sup>

Acculturative stress may also be a risk factor. In a study conducted among Hispanics in Dallas County, Texas, low-acculturated individuals were less likely to have hypertension than those who were more highly acculturated,<sup>21</sup> following adjustment for sociodemographic factors, health care access, and utilization, health behaviors, and health status. In contrast, in a cross-sectional investigation of Hispanic participants from the Multi-Ethnic Study of Arteriosclerosis (MESA), associations between speaking Spanish versus English at home and number of years living in the U.S. and hypertension were eliminated after adjusting for education.<sup>9</sup> In a later study of the MESA (Hispanic) cohort that examined effect measure modification due to psychosocial stress and social disadvantage, income levels modified the association between air pollution and blood pressure but chronic stress, depressive symptoms, trait anger, trait anxiety, and lack of emotional support did not.<sup>22</sup>

Because cultural groups have a set of basic common beliefs and values that differentiate them from other groups, proper assessment tools must be developed in the context of those values and beliefs.<sup>23,24</sup> For example, Snipes et al.<sup>25</sup> used ethnopsychology principles to design stress measures for Mexican farmworkers in the cultural context in which they live and work. Furthermore, researchers must exert cultural sensitivity when developing

questionnaires or other instruments to gather data in a study. Community-engaged research (CER) supports a multi-level approach that leads to sound scientific inquiry and the development of interventions that can be directly applied to the participating communities.<sup>26</sup>

The purpose of this paper is to describe the CER process that was applied to develop a questionnaire, primarily focused on psychosocial stressors and activities and behaviors that influence exposure to air pollution. The questionnaire is currently being used in an epidemiologic study to assess whether individual- and neighborhood- level psychosocial stressors modify associations between hypertension and exposures to fine particulate matter and other air pollutants. The study is being conducted among individuals of Mexican origin who represent nearly 80% of all Hispanics<sup>27</sup> living in Houston, Texas—a region with documented poor air quality.

## Methods

### Population.

The epidemiologic study entitled *Hypertension in Mexican-Americans: Assessing Disparities in Air Pollutant Risks* is funded by the U.S. Environmental Protection Agency through a grant to the University of Texas Health Science Center at Houston and involves approximately 2,400 individuals of Mexican-origin from the Mexican American Cohort Study (MACS). The MACS was established in 2001 in the Department of Epidemiology at the University of Texas MD Anderson Cancer Center (MDACC). In personal interviews administered at baseline, participants provide information about sociodemographic and other characteristics. All participants receive a follow-up phone survey every six months. As of April 2014, there were 23,665 (5,861 men; 17,804 women) participants from 16,011 households taking part in the MACS.

### Partnership development and community participation.

To obtain community perspectives of the health consequences of environmental and psychosocial stressors experienced among the Mexican-origin population in Houston neighborhoods, a multi-level approach was used. This approach involved: (1) the formation of a Neighborhood Council of Advisors (NCA), as guided by expert advice from the MDACC MACS Community Advisory Board (MACS-CAB); (2) four participant samples recruited from the MACS to form focus groups; and (3) the development, testing, and refinement of a pilot questionnaire.

### Neighborhood Council of Advisors (NCA).

A community advisory board (NCA) was established as one of the first steps in the CER process. Potential members were identified by a long-term community organizer (MJ) who has established ties to the community. In the end, the 16-member NCA reflected the complexity of the neighborhoods under study and included a janitor, a nurse, a county employee, a housewife, a retiree, a student, an accountant, a legal case worker, a community organizer, a community center director, a school bus driver, a lay religious leader, and four people unable to work because of disabilities.

A minimum of nine advisors attended each of the four scheduled NCA meetings. Specifically, the NCA (1) provided input about recommended changes in the content probe questions to be used in the focus groups; (2) reaffirmed the focus group findings regarding sources of pollution and stress and community health impacts; and (3) provided insight on culturally-specific wording, meaning, and accurate translation of potential questions for the pilot questionnaire. Additionally, they provided suggestions for sustained participation and strategies for community education.

### **Recruiting and participant selection for focus groups.**

During routine MACS follow-up phone calls, the MDACC staff inquired of an interviewee's interest in taking part in focus groups for a study on hypertension, air pollution, and social stressors. Adult participants were recruited to the following four groups: (1) women who preferred to speak Spanish; (2) women who preferred to speak English; (3) men who preferred to speak Spanish; and (4) men who preferred to speak English. For each group, 20 cohort study participants were identified and informed that they would be contacted by an UTSPH academic team member by telephone to confirm their participation, clarify any questions, and discuss arrangements for any special needs expressed as a condition for attending the focus group. It was expected that six to 10 members would participate, which was the targeted size per focus group.<sup>28</sup> For those who remained interested following the phone call, a formal letter of invitation was sent in their language of choice and reminder calls were made a day before each focus group meeting.

### **Focus group procedures.**

During the planning of the focus groups, each research team member was encouraged to take a reflective approach to avoid potential bias in the data collection.<sup>29</sup> The four focus groups were held at a neighborhood center well known to participants. For those participants who did not have transportation, a taxi service was used to ensure attendance. Light refreshments were provided. All four focus groups were staffed by one bilingual facilitator and three bilingual note-takers from the academic team. Bilingual interpreters were available for simultaneous interpretation. The facilitator introduced the academic team members and described the procedures that would be followed. Following a question-answer period, participants were asked to provide written informed consent.

Each focus group consisted of a two-hour discussion that included content probe questions (available in English and Spanish) to explore these topics: (1) things participants liked and disliked about their neighborhoods; (2) the quality of the neighborhoods in which participants lived; (3) ideas about how air, water, and noise pollution may adversely affect health; (4) stressors in their communities or households; and (5) ideas about how the quality of the neighborhood and the manner in which people treat each other influence health. When necessary, additional content probe questions that primarily dealt with stressors at home or at work were used to clarify, focus, or expand the conversation. Before moving on to a new question, the facilitator summarized what had been learned and asked participants whether the summary was correct. The focus group session ended with an invitation to the group for further comments on any topic of their choice. Participants received a \$20 gift card and a

resource list of health care and environmental health agencies that provide services in the city.

To minimize subjectivity, the academic team members conducted a debriefing session immediately following each focus group and compared observations regarding the interpretation of questions, common or emerging themes in the discussion, and non-verbal messages. For focus groups two through four, the academic team also compared what was learned with lessons from earlier focus groups. Verbatim transcriptions were prepared from the audiotaped recordings. The Spanish language transcriptions or Spanish language segments in the predominantly English transcriptions were subsequently translated into English. Notes taken by the academic team focus group observers were used to guide the recording of the flow of the discussion and corresponding speakers.

### **Content analysis of focus group discussions.**

To increase the reliability and validity of the pilot questionnaire, triangulation—a process that utilizes two different methods of content analysis—was employed to analyze the texts of the four focus group discussions.<sup>30</sup> Working independently of each other, two analysts identified and classified themes that arose from the discussions among focus group participants in response to the content probe questions. One analyst relied on the scissors-and-sort funnel technique and the other analyst used a software-assisted approach for analyzing qualitative data (N Vivo 10 software, QSR International, Burlington, MA). Each analyst then recorded the data into themes used in the content probe questions and prepared summary reports. These reports hereafter are referred to as Report 1 and Report 2, respectively.

To develop Report 1, each transcription was read several times to identify common themes. Lists of responses were made per transcription; differences were also noted. The four lists (one per focus group) were then compared and contrasted in general and by content probe questions. Themes were sorted out, classified, and placed in categories. These listed categories were then joined into broader classifications that brought similar or dissimilar observations together into specific research-related domains. For Report 2, the thematic or inductive content analysis was based on a grounded theory approach. Through open coding, themes or nodes were identified that emerged repeatedly during the course of the discussions. The assembled responses were re-grouped and re-coded as ‘parent nodes’ based on the broad categories in the focus group guide, and, as ‘child nodes’ or ‘sub themes’ based on the content probe questions that were asked under that category. These parent nodes and child nodes were used to label and categorize quotes so that conclusions could be drawn for each category.

### **Questionnaire development.**

The pilot questionnaire was developed based on (1) questions from a survey instrument used to measure stress in Mexican farmworkers;<sup>25</sup> (2) the focus group summary reports; (3) specific input from the NCA; and (4) experience from individuals with expertise in outdoor and indoor air quality, environmental health, and the behavioral sciences. The pilot questionnaire grouped questions into nine domains (see Results) that were identified

and confirmed through the content analyses. The pilot questionnaire was available in both English and Spanish.

### **Pilot questionnaire testing.**

Participants aged 20 years or older who resided in southeast Houston were recruited through routinely scheduled telephone interviews for the MACS. If eligible, MACS members were contacted to confirm their interest in participating in the testing of the questionnaire. Twenty agreed to participate and each participant was given the option of completing the interviews in their own homes or at a nearby neighborhood community center.

Each participant was asked to provide written informed consent before the interview. The pilot questionnaire was administered by the Research Coordinator in English or Spanish, depending on the study participant's preference. A bilingual team member served as an observer and note-taker. During the interview, the Research Coordinator read each question and its scale and noted the participant's answers, while the observer captured the attitudes, comments, and reactions of each participant. The interview process lasted approximately 25 to 35 minutes. Upon completion of the pilot questionnaire, the Research Coordinator made inquiries about their specific responses and requested feedback for ways to improve wording, translation, or reframing of the questions. Once the pilot questionnaire and interview were completed, the academic team members concluded with a de-briefing session. These comments and observations were shared within a few days with other members of the academic team, at which time decisions to change or add questions were made.

The protocols for conducting the focus groups and pilot testing of the questionnaire were approved by the Institutional Review Boards of the University of Texas Health Science Center at Houston and the MD Anderson Cancer Center.

## **Results**

### **Focus group participants.**

Potential participants varied in their responses to the follow-up calls inviting them to be part of the focus groups. Not all of the cohort study members (n=80) who indicated an interest in participating in the focus groups could be reached because phones were disconnected (n=2) or there were no returned calls to the voice mail messages (n=26). Second, some (n=3) misunderstood the purpose of the focus group. For example, one thought it was a health fair and another potential participant thought it was for a medical exam to measure blood pressure. Third, others (n=14) cited changing circumstances as obstacles impeding their participation such as lack of childcare, unexpected family visits, sickness, or rescheduling of work shifts. Fourth, a number of confirmed participants (n=8) chose not to attend on the date of the focus group for unknown reasons. The final number of individuals (n=27) who participated in the focus groups are summarized in Table 1: (1) December 4, 2010, women who prefer to speak Spanish (n=7); January 15, 2011, women who prefer to speak English (n=4); January 29, 2011, men who prefer to speak Spanish (n=7); and February 12, 2011, men who prefer to speak English (n=9).



### Common themes.

Common themes emerged in the reports developed by the two analysts of the focus group discussions. Participants felt air and noise were the most harmful and water the least. Participants thought their neighborhoods were geographically more concentrated near air pollution sources thus having an adverse impact on the health of neighborhood residents. In general, focus group participants liked living in their neighborhoods but felt their neighborhoods lacked resources for healthy living. Poor neighborhood conditions were identified as a source of stress because of a stigma associated with living in these communities. Mention was also made of neighborhoods in constant change that posed new challenges for routine living and tensions between long-term residents and newcomers in the community. Participants identified the disparate impact of the quality of the neighborhood on the health of the elderly, children, and people already ill or with weaker immune systems. They also identified stress due to their own illnesses, those of family members, and neighbors. Additionally, comments were made about constant pressures of difficult economic times on individuals and families. Specifically, participants cited unemployment or having sporadic employment, inability to make household payments, debt, and a lack of savings to meet emergencies or take vacations as major sources of stress.

There were several differences between the findings of Report 1 and Report 2. First, the issue of “not feeling safe” was identified in Report 1, based primarily on comments made by women who cited a number of anecdotal narratives of crimes, violence, or fear of strangers. Examples of such narratives included a family member killed due to a drive-by shooting; auto vandalism; a child beaten by gangs in school; shootings in apartment parking lots; moving due to hostile exchanges with a neighbor; distribution of drugs by neighbors; as well as numerous instances of strangers roaming the streets or parks. However, in Report 2, the finding was that “respondents felt safe to stay within their neighborhoods.” A second finding that diverged between the analysts’ reports was with respect to neighborhood conflict. In Report 1, there were references to many types of neighborhood discord (e.g., homeowner vs. renter, neighbor vs. stranger, native-born vs. immigrant, people of different nationalities, and inter-generational conflicts). In Report 2, there was a finding of “low conflict within the neighborhood.” There were also differences about race- or ethnicity-related discrimination. Whereas there appeared to be “tolerance for different ethnic groups” in Report 2, there were chronicled statements of distrust, rejection, suspicion, or bigotry when referring to other groups in Report 1 (e.g., complaints of discrimination for not speaking Spanish; police harassment due to ethnic origin; and hiring preferences for undocumented immigrant workers over native-born workers). Finally, Report 2 stated that “respondents identified finances to be the most prominent cause of stress” whereas Report 1 identified other causes of stress that were equally as important (e.g., discrimination, family illness, and everyday living situations).

Based on the analyses of the focus group discussions, several domains of psychosocial stress were identified that guided the development of the questions in the pilot survey. These domains included: finance-related stress (2 questions); employment-related stress (4 questions); individual/family-related stress (6 questions); pollution-related stress (n=4 questions); home/neighborhood-related stress (3 questions); discrimination-related stress (2

questions); neighborhood activities-related stress (3 questions); indoor/outdoor experiences (7 questions); and individual health impact of stress (4 questions). Because of the differences between the two Reports, as described above, specific questions were developed to probe further into concerns about safety in the neighborhood, mistreatment due to race/ethnicity, and stress from family illnesses.

### Development of the final study questionnaire.

Table 2 presents a summary of participants recruited to take the pilot questionnaire. Thirty individuals were initially contacted; five did not respond to phone calls and two declined due to work and family obligations. Three respondents asked that one or more family members complete the pilot questionnaire in their place because of work or business commitments. In the end 20 individuals completed the survey. Of these, 16 were female and four were male. Two participants did not show for their originally scheduled interview, but rescheduled and completed the pilot questionnaire at a later date. Sixteen participants took the survey in Spanish and four in English.

The 36-question pilot questionnaire underwent numerous revisions during the interviews. Specifically, three initial questions referencing physical activity were modified or deleted. In two questions to measure time spent outdoors, examples of specific outdoor physical activities were dropped from the questions. In addition, one question addressing how often playgrounds or parks were utilized to relieve stress was eliminated. Several questions (n=5) pertaining to domestic violence, lack of respect, discriminatory remarks, and stress when in contact with law enforcement agencies were modified as they were initially too long and cumbersome for participants. Additional revisions included simplifying questions in reference to the year participants were recruited to the MACS, omitting examples embedded in several questions, regrouping questions regarding their work experience, and reframing questions for which feedback suggested an alternative translation from English to Spanish.

During the pilot testing of the questionnaire, discussions surrounding several seminal areas led to the development of new questions. The first matter related to stress caused by family separation. Three participants, a 54 year-old Spanish-speaking woman, a 58 year-old Spanish-speaking man, and a 31-year old Spanish-speaking woman raised the issue of the stress they felt as a result of family living in Mexico or in other U.S. cities. Thus, a question was added asking about stress due to separation from family members who live elsewhere. Second, a 56 year-old male remarked that the pilot questionnaire only addressed neighborhood stressors and not those emanating from societal situations, and he went on to provide two examples of stress suffered due to the abuse of authority. The importance of asking about this source of stress was illustrated in the next administration of the questionnaire. Here, a 44 year-old Spanish-speaking woman immediately reacted to the “new” question by breaking down crying uncontrollably as she re-lived an incident involving the arrest of her husband. Another English-speaking 70 year-old male also validated the need for this question when he emphasized the role that police officers play in raising stress levels of neighborhood residents.

Table 3 presents key examples of how the input from the NCA, focus group participants, and pilot-testing/interview participants informed or led to the development of specific project



activities and culminated in the final study questionnaire. (The questionnaire is available upon request from the authors.)

## Discussion

Community involvement was established through an iterative and multi-level approach that involved the input from the MACS-CAB, the formation of a Neighborhood Council of Advisors (NCA), and the pilot testing of a questionnaire. Feedback from both the NCA and the focus group discussions guided the development of an initial questionnaire that underwent revisions following pilot testing in the community. The final questionnaire is being administered to MACS participants in a study to investigate how individual- and neighborhood-level psychosocial stressors modify associations between air pollution and hypertension. The community will continue to be involved as the academic team will report on the progress of this study to the MACS-CAB, as well as meet with the NCA for their input regarding how to disseminate and translate research findings.

In four meetings with the NCA, attendance increased from nine to 16 community members. Corresponding with this increase in attendance was a heightened intensity of the discussions among the NCA and academic team members. This enhanced engagement over time is reflective of a growing recognition on the part of the NCA and the critical role they played and will continue to play in the larger epidemiologic study.

A study conducted within urban and rural minority communities in Alabama<sup>31</sup> also determined similar environmental health priorities (air pollution and waste, crime, noise, and road issues) as in this investigation. In a review article on risk perception and the socio-cultural perspectives on the public experience of air pollution, Bickerstaff<sup>32</sup> found communities that lacked a strong commitment to the neighborhood were more likely to attribute negative attributes to the neighborhood such as waste, crime, lack of care, and air pollution. Furthermore Bickerstaff's review unveiled that the problem of perceptual effects can extend to what are termed *stigma effects*. In this study, one participant discussed being stigmatized by living in their neighborhood as follows: "We're branded or labeled, you know, low life East End scum or whatever."

A significant strength of this study is the recruitment of participants from the MACS. This ongoing cohort study of individuals of Mexican origin has served as the foundation for research in several innovative areas including how acculturation affects smoking and obesity<sup>33–35</sup> and will provide a unique opportunity to evaluate links between exposures to psychosocial stressors and air pollution and hypertension in a disadvantaged population. Yet, the results from this study should be interpreted prudently as the U.S. Hispanic population is not a homogeneous group. Further, study participants who participated in the focus groups or the pilot testing of the questionnaire represented a relatively small convenience sample and may not be representative of the larger cohort of Mexican-origin individuals residing in Houston, Texas.

Because qualitative research is iterative and not linear, verification strategies are needed to ensure rigor and address validity. Self-correcting strategies were implemented in each phase

of this project to maintain quality and improve validity.<sup>36</sup> These strategies involved the use of researcher reflexivity, academic team member debriefings, and a triangulation technique that included two different content analysis methods. While focus groups provide insight into what individuals have to say and can address complex behavior and motivations, there are a myriad of participant biases (e.g., moderator-style bias, dominance bias, and gender bias) that can skew results.<sup>29</sup> To address many of these biases, focus groups were developed to be homogeneous by gender<sup>28</sup> and conducted in the language preferred by participants. Additionally, the pilot questionnaire was administered to participants individually. Because focus groups are not merely a group interview, research design issues were consistently being addressed at the project and group level throughout the course of this study. However, the authors acknowledge that focus group findings may not be generalizable to larger populations.

The CER approach in this study proved invaluable. The participation of community members via the NCA, focus groups, and the testing of the pilot questionnaire allowed for the gathering of data that helped the academic team capture the complexity involved in exposures to both psychosocial and environmental stressors. Using a qualitative multi-level approach provided rich contextual information that has informed what data are being gathered in the overall epidemiologic study of psychosocial stressors, air pollution, and hypertension. Furthermore, this study is relying on a mixed methods research approach (i.e., the combination of qualitative and quantitative data) that is enabling the authors to focus research questions based on real-life contextual understanding while utilizing multi-level perspectives to incorporate cultural influences.<sup>37</sup>

In the end, the partnership established with the community facilitated the development of a culturally appropriate questionnaire. This questionnaire is being used to collect formative data to investigate the interplay between chemical and nonchemical stressors on hypertension in a Mexican-origin community living in Houston, Texas. The community will remain engaged in other facets of the project through the dissemination and translation of research findings.

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**Table 1.****SUMMARY OF RECRUITMENT OF FOCUS GROUP PARTICIPANTS**

<b>Date</b>	<b>Group</b>	<b>Gender</b>	<b>Language Preference</b>	<b>Number Contacted by UTSPH Staff</b>	<b>Number Confirmed</b>	<b>Number Attending</b>
12.04.10	1	Female	Spanish	20	11	7
1.15.11	2	Female	English	21	9	4
1.29.11	3	Male	Spanish	20	14	7
2.12.11	4	Male	English	20	13	9

**Table 2.****SUMMARY OF RECRUITMENT OF PILOT QUESTIONNAIRE PARTICIPANTS**

<b>Date</b>	<b>Number Contacted by UTSPH Staff</b>	<b>Number Confirmed</b>	<b>Number Interviewed</b>		<b>Place of Interview</b>	
			<b>Male</b>	<b>Female</b>	<b>Home</b>	<b>Community Center</b>
5.21.13	7	7	0	6	1	5
6.14.13	12	7	2	5 <sup>a</sup>	3	4
7.8.13	11	7	2	5 <sup>b</sup>	3	4

<sup>a</sup> includes 2 family proxies in total

<sup>b</sup> includes 1 family proxy in total



**Table 3.**  
**EXAMPLES OF THE ROLE AND IMPACT OF COMMUNITY PARTICIPATION**

Community Participation: Mechanism of Involvement	Community Feedback: Research Design Input	Community Impact: Research Design Outcomes
Neighborhood Council of Advisors (NCA) Meetings	<p>Provided insight into experiences of Mexican-origin residents</p> <p><i>"I see men, who are supposed to be the ones taking care of their families, standing on the corner with no work. Day after day."</i></p> <p><i>"But there is so much to worry about, especially when you hear so many things about anti-immigrant laws, and that they may come to Texas. This causes stress."</i></p> <p>Identified sources of stress</p> <p><i>"It was an abusive marriage, and for the sake of my three daughters, I finally left."</i></p> <p><i>"Some of my family members suffer from asthma, eczema or other respiratory illnesses, while others do not."</i></p> <p><i>"I hear gunshots in the middle of the night."</i></p> <p><i>"How can one relax with all this trash there, knowing that it can cause disease?"</i></p>	<p>Development of focus group themes</p> <p>Now let's talk about stress. Do you think that stress is a problem for people in this neighborhood? What are the things that may cause stress to you or your neighbors?</p> <p>Development of initial pilot questionnaire</p> <p>How often did you feel stressed because of domestic violence in your home?</p> <p>How often did you feel that you or your family's illnesses, such as cancer or asthma, were the result of air pollution?</p> <p>Did you feel worried or stressed about crime in your neighborhood?</p> <p>How often did you feel stressed about too much litter in your neighborhood?</p>
Focus Groups	<p>Furnished descriptive information regarding neighborhood life, health, and stress</p> <p><i>"Also—well—to have many payments to make and the money is not enough. That too can provoke much stress and that is for everyone."</i></p> <p><i>"... I was ... uh ... taking care of my mother who was very ill. I took care of her for five years. By the time my mother left, I was—I mean ah—my head felt like it was going to explode."</i></p> <p><i>"These plants over here. They used to unleash at night—always at night, late at night—a horrible odor. It would just gag you."</i></p> <p><i>"The ... the illegals ... they ... they come specifically to our area to get jobs ... These people are on bicycles or they're walking and you ... a lot of them you've never seen before so, you have ... you have to be a little bit on your guard."</i></p> <p><i>"I think the 18-wheelers ... They pass a lot where I live—going to the ship channel. They destroy the streets, you know—water pipes and all that."</i></p>	<p>Development of initial pilot questionnaire</p> <p>How often did you worry about not having enough money to pay your bills or buy food for your family?</p> <p>How often did you feel stressed because you were caring for a sick family member, such as a spouse or mother?</p> <p>How often did you feel worried or feel stressed about the effects of air pollution on you or your family's health?</p> <p>How often did you feel worried or stressed about being safe in your home or neighborhood?</p> <p>How often did you feel stressed about traffic and/or construction taking place in your neighborhood?</p>
Piloting of Questionnaire	<p>Recommended additional questions</p> <p><i>"I have family in Mexico and I am stressed about it."</i></p> <p><i>"You just ask about the neighborhood and not about larger problems. The biggest problem is with authorities and you have no question on this."</i></p>	<p>Added questions to the final questionnaire</p> <p>How often did you feel stress because you were separated from your family living in other cities or in Mexico?</p> <p>How often did you feel stress when coming into contact with law enforcement, such as the police or other government agencies, as when paying taxes or dealing with a legal action?</p>