

**UNIVERSIDAD DE GRANADA**  
**DEPARTAMENTO DE ANTROPOLOGÍA SOCIAL**



**TESIS DOCTORAL**

***PROJECT SALUD. LESSONS LEARNED IN FILLING PUBLIC  
HEALTH GAPS: BUILDING COMMUNITY CAPACITY AND  
CULTURALLY APPROPRIATE KNOWLEDGE TO PREVENT HIV  
INFECTION IN THE IMMIGRANT LATINO COMMUNITY***

**AUTOR**

**JESÚS SÁNCHEZ JIMÉNEZ**

**DIRECTOR**

**JUAN FRANCISCO GAMELLA**

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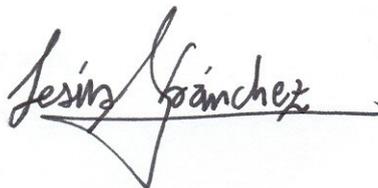
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Granada, 30 de mayo de 2014

Director/es de la Tesis

Doctorando

A handwritten signature in black ink, reading "Jesús Sánchez Jiménez". The signature is written in a cursive style with a long horizontal stroke at the end.

Fdo.: Juan Francisco Gamella Mora

Fdo.: Jesús Sánchez Jiménez

## **Agradecimientos**

Presento aquí una tesis doctoral que deriva de un proyecto de investigación e intervención realizado en las ciudades de Miami, Homestead y Florida City, en el estado norteamericano de Florida. Este proyecto de estrecha colaboración con una comunidad de trabajadores inmigrantes de origen latino se empezó a gestarse en el año 2006 y sigue todavía en marcha, aunque el trabajo al que aquí me refiero se centra en los tres años que van del 2008 al 2010. Como fruto de esta investigación, hemos publicado varios artículos en revistas internacionales, que apporto como muestra del rigor que hemos perseguido en el desarrollo de los materiales.

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Durante los últimos años, mi relación con la población inmigrante de origen Latino—a fin de cuentas, yo me considero uno de ellos—ha ido desarrollándose tanto en el terreno académico como en el personal. Me sería imposible citar a todas aquellas personas y organizaciones que han jugado—y siguen jugando—un papel fundamental en dicha relación, pero no puedo menos que referirme al Farmworker Association of Florida y algunos de sus miembros, Tirso, Sergio, Yuritz, Elvira y Holly. Este trabajo que aquí presento nunca hubiera sido posible sin su apoyo.

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## **RESUMEN DE LA TESIS**

El núcleo de la tesis se presenta en inglés, que ha sido el idioma en que he elaborado los materiales de investigación y las comunicaciones científicas. Los materiales de intervención que presento en el apéndice se presentan en español, porque éste ha sido el idioma fundamental de intervención con la población diana. Presento a continuación un resumen de la tesis en español.

Los latinos, que ahora constituyen la minoría étnica más grande y de más rápido crecimiento en los Estados Unidos, siguen siendo afectados por el VIH/SIDA en una forma desproporcionada. La infección por el VIH es una amenaza grave para la salud de la comunidad latina (o hispana). En el 2010, los latinos representaron más de un quinto (21% o 9.800 casos) de las nuevas infecciones por el VIH en los Estados Unidos aun cuando eran alrededor del 16 % de la población total de este país (CDC, 2014). En el 2010, los hombres hispanos o latinos representaron el 87 % (8500) de las nuevas infecciones por el VIH que se estima ocurrieron entre los hispanos o latinos en los Estados Unidos. La mayoría (79 % o 6700) de las nuevas infecciones por el VIH que se estima ocurrieron entre los hombres hispanos o latinos se atribuyeron al contacto sexual entre hombres (CDC, 2014). Entre los hombres latinos que tienen relaciones sexuales con hombres el 67 % de las nuevas infecciones por el VIH estimadas ocurrió en aquellos menores de 35 años. Las mujeres hispanas o latinas representaron el 14% (1.400) de las nuevas infecciones por el VIH que se estima ocurrieron entre todos los hispanos o latinos en los Estados Unidos en el 2010. La tasa aproximada de nuevas infecciones por el VIH en latinos en los Estados Unidos, en el 2010, fue más del triple que la de los de raza blanca (27.5 frente a

8.7 por cada 100.000 habitantes) (CDC, 2014). En el 2011, los hispanos o latinos representaron el 22 % (11.057) de los 50.199 nuevos diagnósticos de infecciones por el VIH estimados en los Estados Unidos. De los 11.032 adultos y adolescentes latinos a los que se les diagnosticó la infección por el VIH en el 2011, el 84 % (9.256) eran hombres y el 16 % (1.776) mujeres (CDC, 2014).

Existe una creciente evidencia de que la epidemia del VIH/SIDA está cada vez más concentrada en las comunidades inmigrantes, donde las personas origen latino están a menudo representadas desproporcionadamente (Karon et al., 2001). Esas comunidades se enfrentan por lo general con muchos otros problemas sociales y de salud y tienen recursos limitados para responder a la epidemia. Los factores socioeconómicos, como la pobreza, los patrones de migración, el bajo nivel de educación, el seguro médico insuficiente o inexistente, el acceso limitado a la atención médica y las barreras del idioma, pueden contribuir a la infección por el VIH en las latinas en los Estados Unidos (Kaiser Foundation, 2014).

Los factores culturales también pueden afectar el riesgo de contraer la infección por el VIH. Varios estudios han revelado que algunos latinos eviten hacerse pruebas de VIH y que no buscan consejo o tratamiento para la infección a causa de su situación migratoria, el estigma o el miedo a ser discriminados. Los roles de género tradicionales, los patrones culturales (como el machismo, que enfatiza la virilidad en los hombres hispanos o latinos y el marianismo, que exige pureza en las mujeres latinas) y el estigma alrededor de la homosexualidad pueden dificultar la prevención (Kaiser Foundation, 2014).

A pesar del riesgo desproporcionado de contraer el VIH entre la población latina y, más concretamente, entre los inmigrantes latinos, el desarrollo, implementación y evaluación de

intervenciones preventivas ha sido muy limitado. En comparación con las estrategias de prevención dirigidas a otros grupos—y a pesar de su alto riesgo de infección—el número de estudios dirigidos a trabajadores inmigrantes de origen latino que trabajan y viven en los Estados Unidos ha sido mínimo. Los estudios disponibles indican que la mayoría de estos trabajadores se infectan una vez que viven en los Estados Unidos, lo cual acentúa la necesidad de aumentar y contextualizar las estrategias de prevención en esta población (Sheldin et al., 2005).

Los programas de prevención de VIH para trabajadores inmigrantes de origen latino necesitan contextualizar el riesgo del VIH en la vida de los participantes de manera que identifiquen medidas de protección que les sean pertinentes y estrategias realistas para adoptarlas. Se deben considerar los retos de ser un trabajador inmigrante latino radicado en los Estados Unidos., de experimentar el racismo y la exclusión, y de las posibles barreras debidas a la pobreza y a la marginación social. Además se necesitan programas culturalmente adecuados de orientación y capacitación en español, así como programas educativos adaptados a las necesidades de esta población. También es muy importante fomentar la participación de los miembros de estas comunidades de trabajadores inmigrantes en el proceso de investigación y prevención del VIH para asegurar que estas intervenciones son efectivas tanto en el corto como el largo plazo. Numerosos estudios han constatado que las comunidades minoritarias—incluida la de los trabajadores inmigrantes de origen latino—responden mejor y se benefician más de cualquier estrategia preventiva cuando dichas estrategias son refrendadas y apoyadas por la propia comunidad, se mantienen en el tiempo y se atiende a las necesidades generales de la propia comunidad (Parker et al., 2000; Arcury et al., 1999). En las últimas dos décadas, la mayoría de las iniciativas investigadoras cuyo punto de partida ha sido el de implicar a aquellas

comunidades que eran objeto de dichas investigaciones han estado estrechamente ligadas a un paradigma conocido en el mundo anglosajón como *Community-Based Participatory Research* (CBPR).

En las últimas décadas, la investigación comunitaria participativa (en inglés, CBPR) ha emergido como un paradigma que cuestiona algunos de los principios básicos de la orientación científica positivista. En los años sesenta, múltiples crisis académicas y sociopolíticas en diversas partes del mundo presentaron un reto a la relación tradicional entre las instituciones universitarias y la sociedad, y precipitaron la búsqueda de nuevos modelos de investigación. Asuntos tales como la propiedad del conocimiento, el papel del investigador y su relación con la sociedad, el papel de la comunidad en los procesos de investigación y las relaciones de poder en el marco de la investigación social comenzaron a permear el discurso académico.

Dentro del campo de la salud pública, una de las principales lecciones adaptadas del modelo de investigación comunitaria participativa ha sido la de reorientar la dirección de las iniciativas de salud pública que tradicionalmente han fluido de arriba (políticos, administradores, e investigadores) hacia abajo (comunidades) para hacerlas fluir de abajo hacia arriba.

Como alternativa al modelo positivista que ha imperado en la ciencia e investigación, la investigación comunitaria participativa reconoce que el conocimiento tiene un origen social y que los problemas que afectan a cualquier grupo social solo pueden ser adecuadamente solucionados si aquellos individuos y comunidades afectados por un problema son una parte fundamental y activa en la solución de dicho problema.

En esta tesis se presentan los resultados de un proyecto de investigación financiado por el *National Institutes of Health* (NIH) destinado a prevenir la infección por VIH entre trabajadores inmigrantes de origen Latino en el sur de Florida. Este proyecto—conocido en la comunidad como Proyecto Salud—se realizó dentro del marco de la investigación comunitaria participativa de manera que la implicación y participación de la comunidad de inmigrantes latinos fue muy significativa.

El Proyecto Salud responde a una prioridad de NIH que consiste en establecer colaboraciones igualitarias entre comunidades e investigadores que contribuyan a incrementar la participación de la comunidad en el proceso de investigación, mejoren la salud de los miembros de la comunidad, y reduzcan las desigualdades existentes en relación a la epidemia de VIH. Uno de los propósitos fundamentales del Proyecto Salud era el desarrollo de un programa de prevención del VIH a través de una combinación eficaz de intervenciones cognitivas y del comportamiento con el objetivo de mejorar la salud de los trabajadores inmigrantes de origen latino, uno de los grupos más ignorado en relación al impacto de la epidemia de VIH en los Estados Unidos. Los resultados de este estudio permitirán establecer la eficacia del programa de prevención a través de su impacto en la modificación de comportamientos de riesgo al mismo tiempo que mejora la concienciación acerca del VIH, la autoeficacia y las capacidades de adaptación en esta población.

Esta tesis está dividida en cuatro capítulos. El **Capítulo 1** consiste en una introducción sobre el impacto de la epidemia de VIH/SIDA en la comunidad Latina en los Estados Unidos y, más concretamente, en la comunidad inmigrante de origen Latino. Los siguientes tres capítulos desarrollan el trabajo y resultados realizado a través de los dos proyectos de investigación.

El **Capítulo 2** (“Building a Community Partnership”) presenta los resultados de un programa educativo dirigido a miembros de la comunidad inmigrante de origen latino. Los investigadores y miembros de la comunidad de trabajadores inmigrantes de origen latino emplearon catorce meses en el desarrollo de un programa de entrenamiento. El desarrollo de dicho programa incluyó el uso de observación participante, grupos de enfoque y entrevistas etnográficas. Seis temas compusieron parte del currículo que se utilizó como parte del programa de entrenamiento: (1) Los principios de la investigación comunitaria participativa; (2) Principios éticos de la investigación; (3) VIH/SIDA y su impacto en la comunidad de trabajadores inmigrantes de origen latino; (4) Salud oral; (5) metodología cualitativa; y (6) metodología cuantitativa.

El programa de entrenamiento consistió en siete sesiones de entrenamiento, una por cada tema del currículo más una sesión final que resumía los puntos fundamentales de dicho currículo. Cada sesión de entrenamiento duraba una media de dos a tres horas y utilizaba una metodología didáctica que se centraba en el diálogo e interacción con los participantes. Un total de 46 participantes—26 mujeres y 20 hombres—participaron en el programa de entrenamiento en grupos de 4 a 6 personas.

Este programa de entrenamiento tenía como objetivo el de generar capacidades investigadoras en la comunidad al mismo tiempo que se creaba una infraestructura tecnológica que permitiera el desarrollo de dichas capacidades. A tal efecto, a través de la colaboración con la Asociación de Trabajadores Agrícolas de Florida (en inglés, *Farmworker Association of Florida* o FWAF), se estableció un centro de investigación en la sede de dicha asociación destinado a apoyar las labores de investigación centradas en dicha comunidad y objetivo final de

permitir el establecimiento de una asociación a largo plazo entre los investigadores académicos y la comunidad inmigrante de origen latino que permitiera la implementación de un proyecto de investigación comunitaria participativa.

El **Capítulo 3** (“Development and Cultural Adaptation of an HIV Prevention Intervention”) describe la creación de una intervención para la prevención del VIH (A-SEMI) adaptada culturalmente a la cultura y necesidades de la comunidad inmigrante de origen latino a través de un modelo de investigación comunitaria participativa. Este programa utilizó una metodología cualitativa a través de grupos de enfoque para la adaptación cultural de intervenciones que han demostrado su eficacia entre otros grupos y contextos culturales. Un total de 83 miembros de asociaciones, organizaciones, etc. representativos de la comunidad de trabajadores inmigrantes de origen latino participaron en los 8 grupos de enfoque que se realizaron. Cada grupo de enfoque duró entre dos y tres horas y se centró en la discusión del impacto de la epidemia de VIH en la comunidad y de cómo adaptar e implementar una intervención para la prevención del VIH en la comunidad. Los investigadores presentaron a los participantes en estos grupos de enfoque diferentes intervenciones que habían sido eficaces en la prevención del VIH en otras comunidades y a continuación se inició un intercambio de ideas acerca de cómo dichas intervenciones podrían ser adaptadas a la idiosincrasia y necesidades de su comunidad. El resultado fue una intervención (A-SEMI) culturalmente adaptada para ser implementada entre los miembros de la comunidad de trabajadores inmigrantes de origen latino.

Finalmente, el **Capítulo 4** (“Testing the Efficacy of a Culturally Adapted HIV Prevention Intervention”) evalúa la eficacia de la intervención para la prevención del VIH descrita en el capítulo anterior. Este capítulo describe la implementación de una metodología

cuantitativa para recabar información de una muestra aleatoria de 278 miembros de la comunidad inmigrante de origen latino. Después de recoger estos datos de referencia, los 278 participantes fueron aleatoriamente asignados a una de las dos intervenciones: *Adapted Stage-Enhanced Motivational Interviewing* (A-SEMI) o una intervención estándar conocida como *Health Promotion Comparison* (HPC). Después de recibir dichas intervenciones en cuatro sesiones de unas dos horas y media de duración, los participantes volvieron a ser entrevistados a los 3 y 9 meses con el propósito de evaluar los efectos a corto y largo plazo de dichas intervenciones.

En definitiva, los resultados presentados en esta tesis describen el desarrollo e implementación de un proyecto de investigación comunitaria participativa cuyo objetivo es la prevención del VIH en la comunidad de trabajadores inmigrantes de origen latino. Este proyecto es descrito desde sus orígenes hasta su implementación e ilustra la posibilidad de desarrollar proyectos de investigación comunitaria participativa que impliquen en todas sus fases a aquellos a quienes van destinados y, como consecuencia, tengan más posibilidades de éxito.

## REFERENCES

Arcury TA, Austin CK, Quandt SA, et al. Enhancing community participation in intervention research: farmworkers and agricultural chemicals in North Carolina. *Health Educ Behav.* 1999; 26(4):563-78.

Centers for Disease Control and Prevention. HIV among Hispanic/Latino: January 2014. Accessed 2014 May 16. URL: <http://www.cdc.gov/hiv/hispanics/index.htm>

Karon J., et al.,(2001) HIV in the United States at the Turn of the Century: An Epidemic in Transition. *American Journal of Public Health*, 91 (7), 613-630.

Parker RG, Easton D, Klein CH. Structural barriers and facilitators in HIV prevention: a review of international research. *AIDS.* 2000;14(1):S22-S32.

Sheldin D.S., Decena CU, Mino M. Research challenges to the study of HIV/AIDS among migrant and immigrant Hispanic populations in the United States. *J Urban Health* 2005;82(2):iii13-25.

# **CHAPTER 1**

## **THE IMPACT OF THE HIV PANDEMIC IN THE LATINO MIGRANT POPULATION**

### **1.1 The Disproportionate Impact of the HIV/AIDS Epidemic on Latinos in the US**

At 16.7% of the US population, Latinos are the largest and fastest growing ethnic minority in the US (US Census Bureau, 2012). The Latino community living in the United States has been disproportionately impacted by the HIV/AIDS epidemic. The CDC estimates that Latinos accounted for 20% of new HIV infections in 2009 while they represented 16% of the US population. In 2009, Latino men accounted for 79% of new infections among all Latinos and the rate of new infections among Latino men was two and a half times as high as that of white men (39.9 per 100,000 vs. 15.9 per 100,000). While Latina women accounted for 21% of new infections among Latinos in 2009, their rate of HIV infection was more than four times that of white women (11.8 per 100,000 vs. 2.6 per 100,000) (CDC, 2010).

Understanding and addressing the causes of HIV related health disparities among Latinos in the U.S. is increasingly relevant as the magnitude of immigrant and migrant populations from Latin America and the Caribbean continue to grow (US Census Bureau, 2012). The Latino community living in the United States has been disproportionately impacted by the HIV/AIDS epidemic (CDC, 2010), while the development, implementation, and evaluation of HIV prevention interventions designed to reduce the risk of infection among Latinos lags behind prevention efforts targeting other communities (CDC, 2011). This public health gap is particularly apparent when considering the sparse attention received by Latino migrant workers

in the United States despite their high risk for HIV infection. Research indicates that most Latino migrant workers (LMWs) become infected while in the U.S., underlining the importance of enhancing both HIV prevention and treatment efforts (Sheldin et al., 2005).

Migrant workers have always lived in the shadows of communities, living and working under hazardous unsanitary conditions while surviving on meager wages with poor access to education, welfare, and health care. Since the emergence of the United States as a republic, agriculture and the small family farmer were considered essential components of democracy. These small farmers, except in the slave dependent South, relied on family, locally hired hands, or neighbors to meet the seasonal labor demands of agriculture (Thompson & Wiggins, 2002). As the crop production grew larger and more specialized, labor was required on a more seasonal basis. By the 1850s, demand for farming production increased to a level that immigrants from several countries were brought in by employment agencies to meet the demand. Along the east coast, African Americans and poor Anglos joined newly arriving European immigrants as part of the seasonal labor force. While on the west coast, farmers began hiring large numbers of immigrants from China, Japan, and Mexico. In the South, the seasonal need was met by slaves, and after the Civil War, by former slaves, Native Americans, and poor Anglos.

By 1900, U.S. cities grew and the country's industrial base expanded to a point where large-scale commercial agriculture became an economic necessity, and with it a labor force tailored to its needs. The demand for immigrant labor continued into 1917, when the U.S. entered into World War I. As a result of the war, the country was faced with growing war time food demands and an increased shortage of agricultural laborers. In response, Congress passed the Immigration and Nationality Act of 1917. This law established a legal basis for the

importation of some 73,000 Mexican workers (Thompson & Wiggins, 2002). However, like all other industries in the United States at the time, the agricultural economy worsened with the onset of the Great Depression. Foreign demand for U.S. agricultural exports plummeted and prices dropped. In an effort to open up jobs to native-born citizens, the Immigration and Naturalization Service cooperated with local authorities to deport Mexican immigrants and Mexican-American citizens by the thousands. In all, more than 400,000 *repatriados* were deported (Thompson & Wiggins, 2002).

The United States entered World War II on December 8, 1941. To meet the challenge of war, industrial and agricultural production increased and much of the nation's human resources were diverted to the military. Similar to their experiences in World War I, commercial farmers faced a high demand for their products, but growers were without sufficient labor to produce them. The United States once again called upon Mexico to fill the labor void. The two countries signed the Bracero Agreement in 1943, which began the importation of laborers or "braceros" from Mexico to work in the United States. Although originally devised to meet World War II shortages, the Bracero Program continued until 1964 under a variety of legislative authorities, ultimately employing 5 million Mexican laborers. Following the termination of the Bracero Program in 1964, farm employers turned to the H-2 program for their labor needs. This program, now known as the H-2A program, continues today (Thompson & Wiggins, 2002).

Public awareness of migrant farmworkers and the conditions they lived in surged during the 1960s. One of the first steps in increasing public awareness for farmworkers was the Edward R. Murrow documentary titled "Harvest of Shame", which aired on Thanksgiving Day, 1960. The program detailed the exploitation of migrant farmworkers by large agribusiness and

highlighted their poor living and working conditions. In addition to the documentary, the farm labor movement of the 1960s had a great impact on the public and the lives of farmworkers.

At the present time, it is estimated that there are over 3 million migrant farmworkers in the United States, a large majority of which (78%) are male and of Latino origin (88%) (Carroll et al., 2011). According to these same estimates, only 30% of these migrant workers can speak English well while 35% do not speak English at all. Migrant workers in the United States have an average age of 36 and their average level of completed education is 8<sup>th</sup> grade. As reported by the 2010-2012 National Agricultural Workers Survey, 48% of migrant workers do not have legal authorization to work in the United States, 83% are paid by the hour, and 37% of migrant worker families have total family income levels below the national poverty guidelines. In addition to low wages, farmworkers rarely have access to worker's compensation, occupational rehabilitation, or disability compensation benefits. Poverty, frequent mobility, low literacy, language and cultural barriers impede farmworkers' access to social services and cost effective primary health care. Although many farmworkers fit eligibility profiles for programs such as Medicaid and the Food Stamp Program, very few are able to secure these benefits because of different state eligibility requirements. Also, there are administrative barriers to medical coverage for mobile populations. The small percentage of farmworkers who do take advantage of health services are faced with further issues: limited means of transportation prejudice because of their status as migrants, the lack of time-efficient healthcare delivery methods and the medical referral system (CIRS, 2002). Although there are good examples of improving farmworker housing conditions, such as the Farmworker Housing Program in Washington (Wilkerson, 2005), for the most part farmworker housing is often substandard or non-existent.

A study conducted in 2008 found that about 89% of the migrant labor camps had an average of 3 violations against the Migrant Housing Act (Vallejos, 2010). The average farmworker spends approximately six months per year doing seasonal work, eight weeks doing nonagricultural work, eight weeks on the road, and is unemployed 10 weeks. Mobility and long days often threaten their health and pose a significant barrier to accessing healthcare (Carroll et al., 2011).

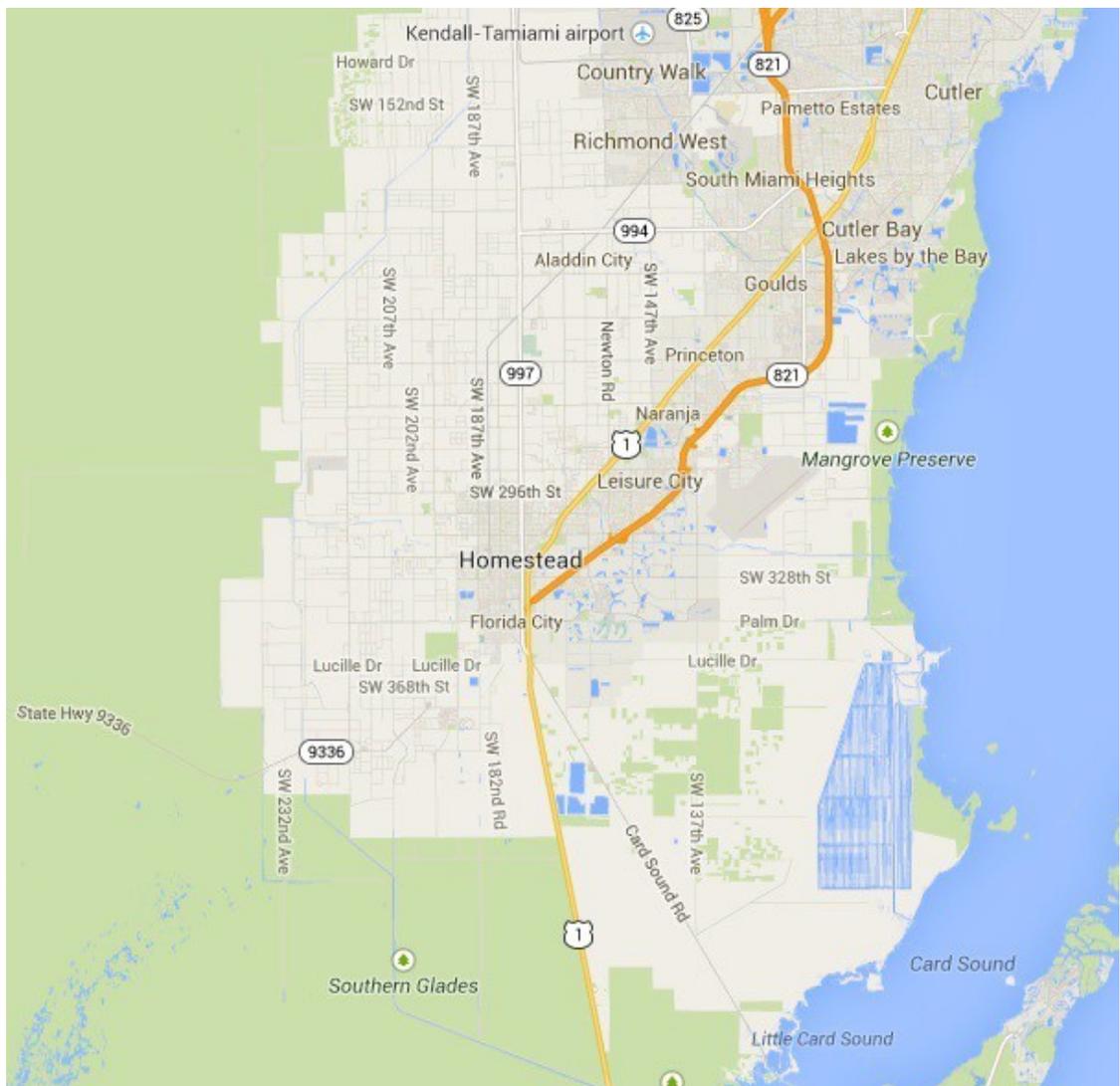
## **1.2 Target Population**

The study takes place among an estimated 20,000 migrant workers who spend part of the year in Miami-Dade County (located mostly in the Homestead/Florida City area) (Larson, 2010), which include approximately 16,000 LMWs, a majority of which features high rates of alcohol and other drug use, unprotected sex, violence and poverty, are uninsured and suffer from multiple health disparities. We believe these figures to be an underestimation of the current number of migrant workers, in general, and LMWs, in particular. For instance, one of our community partners, the Farmworker Association of Florida (FWAF), estimates the number of nurseries at the Homestead/Florida City area at 1,200. The smallest nurseries employ 5 to 10 migrant workers while Acosta Nursery—the largest one in the area—has about 1,000 migrant workers employed year-long.

### 1.3 Risk Factors for HIV Infection among Latino Migrant Workers

Research has specifically linked migration/mobility to increased HIV incidence and vulnerability in a variety of contexts and places. These vulnerabilities are detailed in a monograph (Shtarkshall & Soskolne, 2000; Soskolne & Shtarkshall, 2002) and summarized.

**Figure 1. Map of the Homestead/Florida City area**



here. First, migrant workers (MWs) are a large and growing population with an estimated 125 million people living and often working outside of their country of citizenship, while between two and four million migrate permanently each year. Second, migrant populations have a greater risk for poor health in general and HIV infection in particular due to circumstances, including their economic transitions, decreased accessibility of health services, and the complication of the host country health systems to address the needs of migrants. Third, the uniqueness of migrants often foster a kind of ethnic/racial intolerance, and hostility by the host community which is likely to be even more severe with HIV-positive migrants, particularly regarding stigmatization and discrimination. Thus, migrants may further hide their HIV status as long as possible, thus making support services unavailable for them. Fourth, even if health providers were prepared to assist migrant populations, they would likely encounter great difficulties to reach out to them. Many migrants live in constant fear of deportation, having no stay or work permit for the host country. Therefore, any contact with official government agencies increases that fear and is often accompanied by suspicion. Fifth, compared to migrant-worker populations in other areas of the United States, workers in the southeastern United States are more likely to live away from their families while doing farm and nursery work (64%) and travel in small groups of men (Roka & Cook, 1998; Larson, 2000; Gadon et al., 2001).

Among Latino migrant workers, the risk factors that appear most important are: 1) inadequate or incorrect HIV transmission knowledge (Ford et al., 2001; Organista et al., 1998, 2000; 2) multiple partners and long absences from families (Aranda-Naranjo & Gaskins, 1998; Organista et al., 1998); 3) cultural influences of machismo and *familismo* among single and gay men which may prevent use of safe sex practices; 4) immediate survival problems (e.g., housing,

child care, transportation, exposure to pesticides, employment, medical care, violence) related to indigence and associated disempowerment, that take precedence over the possibility of developing a fatal disease in the distant future (Organista et al., 1998; Aranda-Naranjo & Gaskins, 1998); 5) limited access to HIV risk reduction information, techniques, and support (Castaneda & Collins, 1997); 6) cultural and gender roles and values related to trust and integrity in intimate relationships may deter women from securing safer sex with their steady partners (Sabogal et al., 1987; Mirandé, 1997; Marin & Gomez, 1999; Fernandez et al., 2004; Weatherby et al., 1997); 7) being less likely than non-minorities to discuss HIV/AIDS with others or to receive HIV/AIDS-related support (Gloria & Peregoy, 1996); and 8) alcohol and other drug use (AOD) (Ford et al., 2001). Heterosexual contact facilitated by AOD (particular alcohol and crack cocaine) is the primary mode of HIV transmission in our target population, with little risk exposure due to injecting drug use and needle sharing, (Amaro, 1995; Fernandez et al., 2004). Each of the factors described here, gender, cognitive functioning, acculturation, and potential for sexual abuse, will be measured to determine their influence as moderators on study outcomes. Further, access to services and social norms will be examined as mediators of HIV risks.

#### **1.4 Existing Studies and Gaps in the Literature**

Recent HIV prevention literature (Shtarkshall & Soskolne, 2000) documents the critical need for tailoring effective HIV prevention interventions for high risk HMW populations given a high and rising HIV seroprevalence (i.e., estimated at 2-13%) among the more than 2.5 million migrant workers in the U.S. This literature also highlights numerous potential differences

between migrant and other subgroups. Those distinctions have valuable implications for guiding HIV prevention intervention design emphasizing that many high risk HMW tend to 1) engage in sexual activities, including intercourse, frequently without a condom; 2) engage in risk-producing social interaction (e.g., transient sexual relationships often involving “survival sex”, exploitation and coercion, and relationships with others sharing similar problems); c) use of AOD exacerbates HIV risk (O’Leary et al., 2003; Gadon et al., 2001; Fernandez et al., 2004). This literature also emphasizes the need for tailoring effective HIV prevention interventions according to gender differences (Fernandez et al., 2004).

There are very few HIV prevention migrant studies. In a quasi-experimental HIV prevention study in California, Mishra and Conner (1996) randomly assigned migrant camps to an experimental or comparison intervention. The intervention among Latinos used a *fotonovela* (storybook using photographs) and a *radionovela* (story on the radio), but very few participants listened to the radio stories. While the sample size was small (52 in experimental and 37 in comparison condition), between group differences were significant. For example, between baseline and post-intervention in the experimental group 37.3% more study subjects (compared to the control group’s 10.8%) used a condom during sex. Further, study subjects who reported condom use during sex with a sex worker, reported even greater changes between pretest and post-intervention in the experimental group 7.1% to 65.4% ( $p < .001$ ).

Two studies conducted in Immokalee, Florida also used a quasi-experimental design, randomizing AOD users to experimental or comparison groups. The Cooperative Agreement Study (CA) conducted in Immokalee, FL used targeted sampling techniques (Watters & Biernacki, 1989) to identify a representative sample of migrant workers from among an initial

list of approximately 150 residential sites in the Immokalee area of Collier County, which was expanded to 244 sites to include undocumented and unregistered camps and group housing quarters. Almost 1,000 interviews with migrant workers and sexual partners regarding HIV risk behavior were conducted in English or Spanish (Weatherby et al., 1995; McCoy et al., 1997; McCoy et al., 1999a; Weatherby et al., 1997). Study subjects were subsequently exposed to a Standard (comparison) or Innovative (standard-plus-innovative) intervention, which followed an interactive model based on social cognitive theory. It was conducted using an interactive small group approach in two sessions. The theoretical focus of the Innovative intervention was perception of risk and the identification of supports, barriers, cues, and strategies to change a targeted behavior. At follow-up, separate men's and women's Innovative Intervention groups produced significant short term improvements in safe sex (abstained from sex or always used condoms), safe oral sex ( $p=.0002$ ), safe anal sex ( $p=.00004$ ), and a safe sex composite (including vaginal, oral, and anal sex) ( $p<.00001$ ) for women, but not men. Similarly, for high-risk drug practices, the Innovative intervention was significantly more effective for women than the Standard in drug abstinence ( $p<.00001$ ) and reductions in crack cocaine use ( $p<.00001$ ) and crack use proximal to sex ( $p<.00001$ ) (McCoy et al., 1999a).

In a subsequent study (McCoy et al., 1999b) among rural migrant drug users and their sexual risks for HIV, McCoy conducted a two-phased cognitive behavioral intervention. The first consisted of two sub-phases, 1A and 1B, which assessed the individual, social, and environmental context of sexual risk behavior and sexual risk reduction, and informed the development of interventions to reduce sexual risk in selected drug-user populations. Phase 1A elicited in-depth qualitative information about behavioral and normative beliefs, and barriers and

facilitators related to sexual risk reduction. In Phase 1B, a comprehensive interview instrument about specific risk-reducing sexual behaviors and their antecedents was developed and administered, guided by data collected in Phase 1A. Phases 1A and 1B findings provided theoretical and practical basis for a cognitive behavioral intervention with a theme of eroticizing safe sex. Data from 586 crack smokers recruited from all three sites (Washington, DC, Miami, and Collier County) showed that outcome expectancies and normative beliefs were the strongest predictors of intention to use condoms with a primary sexual partner. Beliefs that condoms inhibit sexual romance and decrease sexual pleasure strongly predicted outcome expectancies. Therapy processes found to be associated with these constructs included: self-liberation, counter conditioning and stimulus control/reinforcement (Bowen et al., 2001a, 2001b). Guided by these results, an HIV risk reduction group “Romance” intervention was designed to 1) target condom beliefs related to sexual romance and pleasure, 2) decrease negative outcome expectancies about condom use, and 3) reinforced attempts to use condoms with intimate partners to increase positive outcome expectancies and intention to initiate or maintain condom use with a primary sexual partner. The “Romance” intervention was then compared to the NIDA standard group intervention (Coyle, 1993) in a randomized study with migrant workers in Collier County. Their findings indicate that the Romance intervention shows promise. Among 162 participants using generalized estimating equations (GEE) analysis, both NIDA and Romance groups showed significant positive change over time from baseline to early follow-up (CI NIDA=0.6312; 1.0183  $p<.07$ ; Romance=0.5064; 0.9647;  $p<.03$  ) and late follow-up (CI NIDA=0.5692; 0.9951  $p<.05$ ; Romance=0.4924; 0.9921  $<.05$ ) on sexual risk behaviors using a composite variable. However, the findings were limited by a lower than expected follow-up rate and uneven follow-up time periods, which were grouped into early (1, 2, 3 months) and late (6, 8, 9, 12) for

interpretation. They found that both groups produced positive change, but no difference in effectiveness between NIDA and Romance groups. Further, the Cooperative Agreement cognitive behavioral study intervention was effective only for women; (Weatherby et al., 1999).

A few key issues are raised by the available HIV prevention studies among migrant workers. First, existing studies have been based on relatively “generic” cognitive behavioral models, enhanced by few contextual social influence variables. Second, gender differences in risk among LMWs need attention. Women encounter different HIV risk issues, and these differences are particularly significant among Latina migrant workers (e.g., partners who resist condom use, gender roles and cultural stereotypes discouraging women’s securing safer sex, economic dependence and other relationship power imbalances, the male-controlled nature of barrier protections). Nevertheless, there is no well-articulated conceptualization of how HIV prevention for Latina migrant workers needs to differ from interventions for men. Third, given the low likelihood that “single shot” interventions adequately help high risk LMW individuals to enact and sustain risk reduction, it appears critical to provide a variety of ongoing community-based services along the migratory stream since LMW adults are most likely to benefit from HIV prevention efforts when other needs are also addressed.

As LMWs struggle for their very existence, preventing HIV infection is far from being a priority with no time, concern and money to prevent it. LMWs are at risk for HIV due to ignorance about healthy lifestyles, poor access to health care, economic status, cultural and language barriers, and isolation from family. The conditions of a migrant lifestyle, mobility, over-crowding; dilapidated housing, poor hygiene and unsafe sex, exacerbate their vulnerability to HIV.

This study contributes much needed information on this population and is innovative for two main reasons: First, the study responds to the NIH priority on establishing equitable partnerships (Chapter 2)—such as CBPR—between communities and researchers with the final goal of increasing community participation in the research process, improving community health, and reducing HIV-related health disparities. Second, in this study, our goal is to develop, culturally adapt (Chapter 3), and administer (Chapter 4) an intervention that will be culturally adapted from the components of effective interventions conducted among other populations in recent years while integrating it within a CBPR framework.

## REFERENCES

- Amaro, H. (1995). Love, sex, and power. Considering women's realities in HIV prevention.
- Aranda-Naranjo, B., & Gaskins, S. (1998). HIV/AIDS in migrant and seasonal farm workers. *Journal of the Association of Nurses in AIDS Care*, 9(5), 80-83.
- Bowen, A.M., Williams, M., McCoy, H.V., & McCoy, C.B. (2001a). Crack smokers' intention to use condoms with loved partners: intervention development using the theory of reasoned action, condom beliefs, and processes of change. *AIDS Care*, 13(5), 579-594.
- Bowen, A., Williams, M., McCoy, H., & McCoy, C. (2001b). An investigation of the psychosocial determinants of condom use among sexually active heterosexual drug users. *AIDS Care*, 13, 579-594.
- California Institute for Rural Studies. Pathways to Farmworker Health Care Case Study No. 1: The East Coachella Valley, 2002.
- Carroll, D., Georges, A. & Saltz, R. Changing Characteristics of U.S. Farm Workers: 21 Years of Findings from the National Agricultural Workers Survey (presentation, Immigration Reform and Agriculture Conference: Implications for Farmers, Farm Workers and Communities, Washington D.C., May 12, 2013).
- Castaneda, D., & Collins, B. (1997). Structure and activities of agencies providing HIV and AIDS education and prevention to Latina /Latino communities. *AIDS Education and Prevention*, 9(6), 533-550.
- Center for Disease Control and Prevention. HIV among Hispanic/Latino. Accessed 2011 August 22. URL: <http://www.cdc.gov/hiv/hispanics/index.htm>
- Center for Disease Control and Prevention. HIV Behavioral Interventions for Hispanics/Latinos in the US: A Meta-Analytic Review. Accessed 2011 August 22 URL: [http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst\\_latinoconsult.pdf](http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst_latinoconsult.pdf)

Census Briefs 2010. The Hispanic population: 2010. Accessed 2011 November 14. URL: <http://www.census.gov/prod/cen2010/briefs/c2010br-04.pdf>

Coyle, S.L. (1993). The NIDA HIV counseling and education intervention model: intervention manual. Rockville, MD: NIDA.

Deren S, Sheldin M, Decena CU, Mino M. Research challenges to the study of HIV/AIDS among migrant and immigrant Hispanic populations in the United States. *J Urban Health* 2005;82(2):iii13-25.

Fernandez, MI., Collazo, JB., Hernandez, N., Bowen, GS, Varga, LM., Vila, CK., Arheart, KL. & Perrino, T. (2004). Predictors of HIV risk among Hispanic Farm Workers in South Florida: Women are at a higher risk than men. *AIDS and Behavior* 8(2), 165-74.

Ford, K., King, G., Nerenberg, L., & Rojo, C. (2001). AIDS knowledge and risk behaviors among Midwest migrant farm workers. *AIDS Education and Prevention*,13(6), 551-560.

Gadon, M., Chierici R.M., & Rios, P. (2001). Afro-American migrant farmworkers: a culture in isolation. *AIDS Care* 13(6):789-801

Gloria, AM, & Peregoy, J.J. (1996). Counseling Latino alcohol and other substance users/abusers. Cultural considerations for counselors. *Journal of Substance Abuse Treatment*, 13(2), 119-126.

Larson, Alice C. (2010). Migrant and Seasonal Farmworkers Enumeration Profiles Study, Florida report, prepared for the Office of Migrant Health, Bureau of Primary Health Care, U.S. Department of Health and Human Services, Bethesda, MD.

Marin, B.V., & Gomez, C. (1999). Latinos and HIV: Cultural issues in HIV prevention. In P.T. Cohen, M.A. Sande, & P.A. Volberding (Eds.), *The AIDS knowledge base* (pp. 10.8-1-13). Boston, Massachusetts: Little, Brown, and Company Publishers.

McCoy, H.V., McCoy, C.B., Lai, S., Weatherby, N.L., & Messiah, S.E. (1999a). Behavior changes among crack-using rural and urban women. *Substance Use and Misuse*, 34(4&5), 667-684.

- McCoy, H.V., Weatherby, N.L., & Yu, Z. (1999b). The Effect of Migration Patterns on Exposure to HIV Prevention in a Migrant Community. *Population Research and Policy Review*, 18(1-2), 155-168.
- Mirandé, A. (1997). *Hombres y machos: masculinity and Latino culture*. Boulder, Colorado: Westview Press.
- Mishra, S.I., & Conner, R.F. (1996). Evaluation of an HIV prevention program among Latino farmworkers. In S.I. Mishra, R.F. Conner, & J.R. Magaña (Eds.), *AIDS crossing borders: The spread of HIV among migrant Latinos* (pp. 157-181). Boulder, Colorado: Westview Press.
- O'Leary, A., Holtgrave, D.R., Wright-DeAguero, L., & Malow, R.M. (2003). Innovations in approaches to preventing HIV/AIDS: applications to other health promotion activities. In Valdiserri, R.O. (Ed). *Dawning Answers: How the HIV/AIDS Epidemic Has Helped to Strengthen Public Health*. Oxford: Oxford University Press.
- Organista, P.B., Organista, K.C., & Soloff, P.R. (1998). Exploring AIDS-related knowledge, attitudes, and behaviors of female Mexican migrant workers. *Health and Social Work*, 23(2), 96-103.
- Roka, F., & Cook, D. (1998). *Farmworkers in Southwest Florida Final Report*. Immokalee, Florida: Southwest. Florida Research and Education Center, University of Florida.
- Sabogal, F., Marin, G., Otero-Sabogal, R., Marin, B.V., & Perez-Stable, P. (1987). Hispanic familism and acculturation: What changes and what doesn't. *Hispanic Journal of Behavioral Sciences*, 9, 397-412.
- Sanchez, J., Silva-Suarez, G., Serna, C., and De La Rosa, M. (2012) The Latino migrant worker HIV prevention program: Building a community partnership through a community health worker training program. *Family & Community Health* 35(2), 139-146.
- Shtarkshall, R., & Soskolne, V. (2000). *Migrant populations and HIV/AIDS: The development and implementation of programmes: theory, methodology and practice*. UNESCO UNAIDS.

Soskolne, V., & Shtarkshall, R.A. (2002). Migration and HIV prevention programmes: linking structural factors, culture, and individual behaviour--an Israeli experience. *Social Science Medicine*, 55(8), 1297-1307.

Thompson, C.D. & Wiggins, M.F. (2002) *The Human Cost of Food: Farmworkers; Lives, Labor, and Advocacy*. Austin, Texas: University of Texas Press.

Vallejos, Q.M., et al. (2010) Migrant Farmworkers' Housing Conditions across an Agricultural Season in North Carolina. *American Journal of Industrial Medicine*.

Waters, J., & Biernacki, P. (1989). Targeted sampling: Options for the study of hidden populations. *Social Problems*, 36, 416-430.

Weatherby, N.L., McCoy, H.V., Bletzer, K.V., Forney, M.A., McCoy, C.B., Inciardi, J.A., & McBride, D.C. (1995). Sexual activity and HIV among drug users: Migrant workers and their sexual partners in southern Florida. *Florida Journal of Public Health*, 7(1), 22-26.

Weatherby, N.L., McCoy, H.V., Bletzer, K.V., McCoy, C.B., Inciardi, J.A., McBride, D.C., & Forney, M.A. (1997). Immigration and HIV among migrant workers in rural southern Florida. *Journal of Drug Issues*, 27(1), 155-172.

Weatherby, N.L., McCoy, H.V., Metsch, L.R., Bletzer, K.V., McCoy, C.B., & DeLaRosa, M.R. (1999). Crack cocaine use in rural migrant populations: Living arrangements and social support. *Substance Use and Misuse*, 34(4&5), 685-706.

Wilkerson, Juli. *Farmworker Housing in Washington State: Safe, Decent and Affordable*. The State of Washington, 2005.

## **CHAPTER 2**

### **BUILDING A COMMUNITY PARTNERSHIP<sup>1</sup>**

#### **2.1 Abstract**

There is limited information on the impact of the HIV/AIDS epidemic on Latino migrant workers (LMWs), although available data indicate that this community is being disproportionately affected. The need for prevention programs that address the specific needs of LMWs is becoming well recognized. HIV prevention interventions that train and employ community health workers are a culturally appropriate way to address the issues of community trust and capacity building in this community. This article describes the Latino Migrant Worker HIV Prevention Program and its efforts to train and engage community health workers in the prevention of HIV among LMWs in South Florida.

#### **2.2 Introduction**

The Latino community living in the United States has been disproportionately impacted by the HIV/AIDS epidemic (CDC, 2010). Furthermore, the development, implementation, and evaluation of HIV prevention interventions designed to reduce the risk of infection among Latinos lags behind prevention efforts targeting other communities (CDC, 2007). This public

<sup>1</sup> A version of this chapter has been published as an independent paper as Sanchez, J., Silva-Suarez, G., Serna, C., and De La Rosa, M. "The Latino migrant worker HIV prevention program: Building a community partnership through a community health worker training program." *Family & Community Health* 35(2), 139-146, 2012.

health gap is even more evident when considering the sparse attention received by Latino migrant workers in the U.S. despite their high risk for HIV infection. Research has specifically linked migration to increased HIV incidence and vulnerability in a variety of contexts and places. First, migrant workers (MWs) are a large and growing population with an estimated 125 million people living and often working outside of their country of citizenship, while between two and four million migrate permanently each year. Second, migrant populations have a greater risk for poor health in general and HIV infection in particular due to circumstances, including their economic transitions, decreased accessibility of health services, and the complication of the host country health systems to address the needs of migrants. Third, the uniqueness of migrants often foster a kind of ethnic/racial intolerance, and hostility by the host community which is likely to be even more severe with HIV-positive migrants, particularly regarding stigmatization and discrimination. Thus, migrants may further hide their HIV status as long as possible, thus making support services unavailable for them. Fourth, even if health providers were prepared to assist migrant populations, they would likely encounter great difficulties to reach out to them. Many migrants live in constant fear of deportation, having no stay or work permit for the host country. Therefore, any contact with official government agencies increases that fear and is often accompanied by suspicion. Finally, compared to migrant-worker populations in other areas of the United States, workers in the southeastern United States are more likely to live away from their families while doing farm and nursery work (Soskolne & Shtarkshall, 2002; Shtarkshall & Soskolne, 2000)

The few available studies on HIV transmission and prevention specifically conducted among Latino migrant workers highlight the role played by risk factors such as inadequate or

incorrect HIV transmission knowledge, limited access to HIV risk reduction information, unprotected sexual practices, alcohol and other drug use, cultural and gender roles, and immediate survival problems (i.e., housing and employment) (Organista et al., 1998; Aranda-Naranjo & Gaskins, 1998; Fernandez et al., 2004; Hernandez et al., 2004; Sanchez et al., 2004). While these studies have made a critical contribution to advance our understanding of the Latino migrant population in the U.S. and highlight numerous potential differences between this and other populations, their HIV prevention interventions have demonstrated only limited effectiveness (Mishra & Conner, 1996; Weatherby et al., 1995; McCoy et al., 1998; McCoy et al., 1999; Weatherby et al., 1997) and documented a critical need for tailoring effective HIV prevention interventions for the Latino migrant population. These adaptations, however, cannot be limited to the cultural translation of existing interventions to be responsive to the cultural uniqueness of Latino migrant populations. The development of new interventions to address HIV prevention in Latino migrant communities needs to take into account their specific circumstances as well as their traditional mistrust of conventional research which they view as paternalistic and irrelevant to their needs. Consequently, culturally adapted interventions must prompt community engagement and participation at every phase of the program if they do not want to remain culturally blind. It is now widely accepted that conventional, single shot interventions are likely to fail to adequately help Latino migrant workers to adopt and maintain HIV risk reduction behaviors in a constantly shifting personal and social environment (Rao et al., 2008; Sanchez et al., 2004; Vega et al., 2009). As a result, it appears critical to provide the Latino migrant worker community with the capacity and infrastructure to prolong community-based HIV prevention activities over time. Latino migrant workers are most likely to benefit from HIV prevention efforts when these efforts are supported at the community level, sustained

over time, and other needs in the community are also addressed (Parker et al., 2000; Arcury et al., 1999).

Community based participatory research (CBPR) has emerged as a research paradigm that addresses the limitations of conventional research models and offers a "collaborative approach to research that equitably involves all partners in the research process and recognizes the unique strengths that each brings. The ultimate goal is to promote social change to improve community health and reduce health disparities" (Minkler & Wallerstein, 2008). Advantages of CBPR include that it is a participatory and cooperative approach, requires equitable power and mutual ownership, is framed in a co-learning experience, and seeks the balance between research and action. Furthermore, it is an empowering process that involves capacity building among all partners involved. Being a collaborative approach, it is understood that the researcher and community members should work as partners during the entire research process, and that trust and mutual respect are aspects that must be present all the time and should guide the relationship among researchers, community members, and all the partners involved in the process (Minkler & Wallerstein, 2008).

Although the call for more CBPR oriented research has increased significantly over the last 15 years, the difficulties in applying such approach to health promotion and disease prevention are significant and constitute a great challenge to researchers and community members. In this paper, we describe (a) Project Salud, a growing CBPR partnership between the Latino migrant community in South Florida and researchers at Nova Southeastern University and Florida International University; and (b) a community health worker (CHW) training program—the Latino Migrant Worker HIV Prevention Program—conducted under Project Salud.

### **2.3 Methods**

Project Salud--officially entitled "HIV Risk Reduction among High Risk Latino Migrant Workers in South Florida"--was a 4-year major study funded by the National Institute on Minority Health and Health Disparities (NIMHD) as part of C-Salud, a P20 Exploratory Center of Excellence at Florida International University. The main objective of Project Salud was to assess the differential effectiveness of an Adapted Stage-Enhanced Motivational Interviewing (A-SEMI) compared to a Health Promotion Comparison (HPC) condition for producing long-term reductions in HIV risk and increased health behaviors among LMWs. The design of the A-SEMI intervention is considered to be an enhancement over existing cognitive behavioral risk reduction approaches because A-SEMI integrates key contextual components from effective HIV prevention interventions (i.e., peer counseling) linked to maintenance of risk reduction effects.

Project Salud was originally conceived as a CBPR project with the goal of engaging the Latino migrant worker community in Homestead in the implementation of an HIV prevention intervention. By framing Project Salud within the CBPR approach, this study responded to the NIH priority on establishing equitable partnerships between community members and researchers with the final goal of increasing community participation in the research process, improving community health, and reducing HIV-related health disparities.

A network-based sample of 278 Latino migrant workers was recruited from November 2008 to March 2010 from migrant communities in the Homestead area in Miami-Dade County, Florida. Homestead is part of a predominantly rural area in the South of Miami-Dade County, Florida. Official census data indicate that most of the population in Homestead (51.8%) is

Hispanic/Latino, more than one-third (36%) is foreign born, and a majority (57.3%) speaks a language other than English at home (US Census Bureau, 2000). Agriculture and nursery constitute an important business in the Homestead area allowing for access to seasonal farm work. Homestead's Latino migrant worker population is composed primarily of recently arrived, young, single or married men who are in the United States alone. They live in small crowded apartments with family or friends. Most are Mexican and Central American arriving in this area with little or no English language skills and very limited resources.

After screening for eligibility, participants were administered a structured baseline questionnaire using A-CASI that included basic socio-demographic information, alcohol and other drug use history, sexual behaviors, acculturation, and behavioral intentionality. An Oral Health questionnaire was also administered at the 9-month follow-up. This study was approved by the IRB of Florida International University.

### ***Barriers to CBPR***

While building trust to involve community members can be a challenge to any CBPR project (Freyder & O'Toole, 2000; Becker et al., 2005; Rhodes et al., 2006), this issue became extremely relevant within the Latino migrant community in South Florida because of the legal status of members of this community. Many community members, including community leaders, were undocumented and extremely hesitant to participate in a process that they did not trust or understand. Consequently, a considerable amount of effort went into the process of developing a relationship of trust with the community. As this relationship developed, it became

clear that the remaining reticence on the part of the community emanated from a deep lack of understanding of the research process, in general, and CBPR, in particular. For our partnership with the Latino migrant community to be a successful one, we understood that this knowledge gap had to be addressed. In commenting on their own experience developing a partnership in the community, Andrews and colleagues pointed out how participants in their study who had formal training in CBPR (i.e. coursework, seminars, mentored experiences) had a better appreciation for the CBPR principles and were more likely to sustain partnerships over time (Andrews et al., 2010). Since none of our partners in the Latino migrant community had any exposure to CBPR, we decided to provide them with that opportunity by creating a training program modeled after existing CHW initiatives within a CBPR framework (Minkler & Wallerstein, 2008; Eisinger et al., 2001; Calleson et al., 2002; ECIPPRG, 2006).

### ***The Latino Migrant Worker HIV Prevention Program***

At the early stages of Project Salud, we planned to address the issue of reinforcing trust in the community while creating community capacity as a key building block in the development of our partnership with the Latino migrant community. We initiated a dialogue with key community partners and community members with the goal of identifying what type of knowledge and skills would be necessary to address the issue of HIV prevention among Latino migrant workers. The ultimate goal of this dialogue was to juxtapose the views of both the community and the researchers. Based on this exchange of ideas and using other researchers' experiences as a learning framework (Minkler & Wallerstein, 2008; Eisinger et al., 2001; Calleson et al., 2002; ECIPPRG, 2006), we have created the Latino Migrant Worker HIV

Prevention Program (LMW-HIVP). LMW-HIVP is a CBPR-based community health worker education program designed to build the knowledge and skills needed at the community level to develop and sustain an effective CBPR partnership to support HIV/AIDS research and prevention in the Latino migrant community.

## **2.4 Results**

### **LMW-HIVP Objectives**

The LMW-HIVP had three main objectives. The first objective was to develop the LMW-HIVP training curriculum and create a training manual and website based on it. The second objective was to implement the training curriculum to educate community members as community health workers (CHWs) and incorporate them into Project Salud's HIV prevention efforts. The training curriculum included various fundamental aspects of HIV research and prevention including community outreach and education, data collection, and findings dissemination. The third and final objective was to provide the community with a permanent research facility.

### **Creating the curriculum**

Our first priority was to create a training curriculum that would provide the Latino migrant community with the knowledge and skills to address the issue of HIV research and prevention in their community from a CBPR standpoint. Qualitative methods were utilized to gain an

understanding of the sociocultural values, beliefs, and practices in the area of HIV/AIDS of Latino migrant workers working and residing in Homestead. Ethnographic methods used during the curriculum development phase included participant observations, focus groups, and one-on-one, in-depth, semi-structured interviews. Project Salud staff spent 14 months in the field attending numerous meetings and community events during which the curriculum was developed.

The curriculum includes six units: CBPR Principles, Research Ethics, HIV/AIDS and its impact on the Latino community in the U.S., Oral Health, Quantitative Methodology, and Qualitative Methodology. Each unit contains learning objectives, in-depth content information about the topic(s) being presented, examples and interactive exercises that are designed to trigger discussion and to help better understand the concepts being presented, and suggested references and resources. The curriculum was built upon a combination of approaches to teaching and learning and customized to the specific needs of the community. It was also developed to build on and reflect existing community strengths and assets.

### ***Implementation of Training Curriculum***

Prior to implementing the training curriculum, we hired two members from the community to be trained on the training curriculum, assist with the development of the training manual, and support training efforts at the community level.

An empowerment model of education was utilized for the delivery of the training program. This model, based on the works of Paulo Freire (Freire, 1973), uses a learning cycle of listening-

dialogue-action. The listening phase involves systematic listening of community concerns. The dialogue phase involves a problem-posing method to enable participants in the analysis of their problems including underlying causes. Finally, during the action phase, the facilitator uses structured dialogue within a participatory interactive model for education to help participants identify and reflect on the actions needed to address identified problems individually and socially within the community (Beeker, 1998; Wallerstein, 1992; Wallerstein & Baker, 1994).

The implementation of the training curriculum consisted of a workshop that included seven 1-day training sessions. The entire workshop took place over the course of two weeks and training participants received \$442 at the end of session seven. The first six sessions of the training workshop were devoted to each of the six units on the curriculum while session seven was a wrap-up session. Although community participants were welcome to offer their feedback throughout the entire 7-day workshop, we conducted a formal evaluation at the end of session seven. We used participants' comments and the formal evaluation to update and improve the training manual so each new cohort of community participants would benefit from these improvements. Forty-six community members--26 females and 20 males--were trained in cohorts of four to six participants.

The success of a CHW program depends in part on recruiting and training individuals with broad social networks who have the time and desire to pass on their knowledge and skills to other members of the community. Our CHW program presented additional challenges since HIV and related risk behaviors—particularly, sex behaviors—are not typically discussed in the Latino culture (De la Vega, 1990). We selected training participants based on the following eligibility criteria: 1) Latino migrant worker; 2) literate; 3) aged 18 and older; 4) open-minded

about discussing HIV and related risk behaviors; and 5) living and residing in the Homestead area for, at least, 4 months of the year.

Project Salud staff viewed retention in the LMW-HIVP as not merely completion of the program, but as active participation in all parts of the program. Therefore, the program addressed issues of access on multiple levels including 1) a relevant and accessible curriculum; 2) teaching methods that fit with cultural norms; 3) making transportation and childcare available to training participants; and 4) providing meals, snacks, and beverages at different points during the training sessions.

### ***Creation of a permanent research facility***

The third objective of the LMW-HIVP was to provide the community with a permanent research facility that would support the community efforts to promote health and prevent HIV infection over time. In a combined effort between Project Salud and one of its main community partners, the Farmworker Association of Florida (FWAF), we created a permanent research environment through the creation of a research facility at the offices of the FWAF in Homestead. This office has been furnished with new computer equipment, printers, software, office supplies and, in general, everything necessary for the day-to-day operation of a research facility, including technical assistance by Project Salud staff. This new research facility currently houses the ongoing LMW-HIVP training workshops and serves as a hub for the array of activities being conducted under Project Salud. For instance, as we are preparing a new grant

proposal to extend and expand Project Salud's HIV prevention efforts in the community, we are using this research facility for CAB meetings, focus groups, and other activities.

## **2.5 Discussion**

Challenges to conducting CBPR are well documented and may discourage researchers and community members from engaging in this type of research (Freeman, et al., 2006; Strickland, 2006; Israel et al., 2005). Project Salud engaged the Latino migrant community in South Florida with the goal of establishing a partnership based on CBPR principles to address HIV prevention. One of the most critical challenges we faced was a lack of understanding on the part of the community regarding research, in general, and CBPR, in particular. We realized that it was not viable to establish and sustain a true collaborative, equitable research partnership with the Latino migrant community unless we could generate co-learning and capacity building opportunities that could provide them with the necessary knowledge and skills as well as maintain HIV prevention efforts in the community.

In response to this assessment, Project Salud has been genuinely invested in building community capacity by developing and implementing a CHW education training program—LMW-HIVP—and creating a permanent research environment in the community. The training program gave community members an opportunity to acquire knowledge and skills on how to conduct research that were very scarce in the community. The training program also increased community awareness and understanding of the effect of HIV epidemic on Latinos in the U.S. and the importance of community efforts to prevent HIV infection in the community. Finally, as

they finished their training, CHWs were integrated into Project Salud's HIV research and prevention activities such as recruitment of study participants, delivery of survey and intervention instruments, and dissemination of information. Following a long standing tradition of training community members in underserved communities and employing them as CHWs (Parker et al., 1998; Jackson & Parks, 1997; Rhodes et al., 2007), LMW-HIVP trainees play a key role in disseminating the knowledge and skills they received as part of their training to promote health, prevent HIV infection, and reduce health disparities in the Latino migrant community. As members of the community, training participants possess an intimate understanding of community social networks, communicate in a similar language, and recognize and incorporate cultural elements to promote health and health outcomes within their community.

However, research and prevention strategies not only require knowledge and skills but the material means to apply them. Project Salud, in partnership with the FWAF, has created a permanent research facility in the Association's offices in Homestead that houses many of the activities related to this project and plans for future ones.

## **2.6 Conclusions**

Community members participating in the training have demonstrated a substantial growth in their competency, knowledge, and skills required to optimizing their contribution to HIV prevention in their community. We have also observed an increase in community awareness and in the number of members of the Latino migrant worker community who have approached

Project Salud staff or any of our community partners asking about testing, resources, and referrals as a result of coming in contact with a CHW. Finally, we have been approached by different migrant worker organizations and clinics about the possibility of partnering in different HIV prevention projects which will sustain the ongoing efforts.

As evidence of the added benefit of their contribution to health promotion and disease prevention continues to mount, CHWs can and should become key players toward the implementation of any CBPR-based project in the Latino migrant population of South Florida.

## REFERENCES

Andrews OJ, Newman DS, Meadows O, et al. Partnership readiness for community-based participatory research. *Health Educ Res.* 2010; PMID: 20837654.

Aranda-Naranjo B, Gaskins S. HIV/AIDS in migrant and seasonal farm workers. *J Assoc Nurses AIDS Care.* 1998;9(5):80-3.

Arcury TA, Austin CK, Quandt SA, et al. Enhancing community participation in intervention research: farmworkers and agricultural chemicals in North Carolina. *Health Educ Behav.* 1999; 26(4):563-78.

Becker AB, Israel BA, Allen AJ. Strategies and techniques for effective group process in CBPR partnerships. In Israel BA, Eng E, Schulz A J, Parker EA, eds. *Methods in community-based participatory research for health.* San Francisco: Jossey–Bass, 2005.

Becker C, Guenther-Grey C, Raj A. Community empowerment paradigm drift and the primary prevention of HIV/AIDS. *Soc Sci Med.* 1998;47:831–842.

Calleson DC, Seifer SD, Maurana C. Forces Affecting Community Involvement of AHCs: Perspectives of Institutional and Faculty Leaders. *Acad Med.* 2002;77(1):72-81.

Centers for Disease Control and Prevention. HIV among Hispanic/Latino. 2010. Available at: <http://www.cdc.gov/hiv/hispanics/index.htm>

Centers for Disease Control and Prevention. HIV Behavioral Interventions for Hispanics/Latinos in the US: A Meta-Analytic Review. 2007. Available at: [http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst\\_latinoconsult.pdf](http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst_latinoconsult.pdf)

De la Vega E. Considerations for reaching the Latino population with sexuality and AIDS/AIDS information and education. SIECUS. Rep 1990; 18:1-8.

Eisinger A, Senturia KD. Doing community-driven research: A description of Seattle partners for healthy communities. *J Urban Health*. 2001;78(3): 519-34.

Examining Community-Institutional Partnerships for Prevention Research Group. Building and Sustaining Community-Institutional Partnerships for Prevention Research: Findings from a National Collaborative. *J Urban Health*. 2006;83(6):989-1003.

Fernandez MI, Collazo JB, Hernandez N, et al. Predictors of HIV risk among Hispanic farm workers in South Florida: women are at higher risk than men. *AIDS Behav*. 2004;8(2):165-74.

Freeman ER, Brugge D, Bennet-Bradley WM, Levy JI, Carrasco ER. Challenges of conducting community-based participatory research in Boston's neighborhoods to reduce disparities in asthma. *J Urban Health*. 2006;83(6): 1013-1021.

Freire P. *Education for Critical Consciousness*. New York: Seabury Press, 1973.

Freyder PJ, O'Toole TP. Principle 2: The relationship between partners is characterized by mutual trust, respect, genuineness and commitment. *Partnership Perspectives*. 2000;1(2):19-25.

Hernandez MT, Lemp GF, Castañeda X, et al. HIV/AIDS among Mexican migrants and recent immigrants in California and Mexico. *J Acquir Immune Defic Syndr*. 2004; 37(4):s203.

Israel BA, Eng E, Schultz AJ, Parker, EA eds. *Methods in Community-Based Participatory Research for Health*. San Francisco, Calif: Jossey-Bass; 2005.

Jackson EJ, Parks CP. Recruitment and Training Issues from Selected Lay Health Advisor Programs among African Americans: A 20-Year Perspective. *Health Educ Behav.* 1997; 24: 418-431.

Mishra SI, Conner RF. Evaluation of an HIV prevention program among Latino farmworkers. In Mishra SI, Conner RF, Magaña JR, eds. *AIDS crossing borders: The spread among migrant Latino.* Colorado: Westview Press;1996.

McCoy HV, McCoy CB, Lai S. Effectiveness of HIV interventions among women drug users. *Women Health.* 1998;27(1-2):49-69.

McCoy HV, McCoy CB, Lai S, et al. Behavior changes among crack-using rural and urban women. *Subst Use Misuse.* 1999;34(4-5):667-84.

Minkler M, Wallerstein N. eds. *Community-based participatory research for health: From process to outcomes.* 2nd Ed. San Francisco, CA: Jossey-Bass; 2008.

Organista PB, Organista KC, Soloff PR. Exploring AIDS-related knowledge, attitudes, and behaviors of female Mexican migrant workers. *Health Soc Work.* 1998;23(2),96-103.

Parker EA, Schulz EA, Israel BA, et al. Worker Partnership: Community-Based Lay Health Advisor Intervention in an Urban Area. *Health Educ Behav.* 1998;25(1):24-45.

Parker RG, Easton D, Klein CH. Structural barriers and facilitators in HIV prevention: a review of international research. *AIDS.* 2000;14(1):S22-S32.

Rao P, Hancy K, Velez M, et al. HIV/AIDS and farmworkers in the US. *Farmworker Justice.* 2008.

Rhodes SD, Hergenrather KC, Montañó J, et al. Using community-based participatory research to develop an intervention to reduce HIV and STD infections among Latino men. *AIDS Educ Prev*. 2006;18(5):375-89.

Rhodes SD, Foley KL, Someta CS, et al. Lay Health Advisor Interventions Among Hispanics/Latinos: A Qualitative Systematic Review. *Am J Prev Med*. 2007;33(5):418-27.

Sanchez MA, Lemp GF, Rodriguez-Magis C, Bravo-Garcia W, Carter S, Ruiz JD. The epidemiology of HIV among Mexican Migrants and recent immigrants in California and Mexico. *J Acquir Immune Defic Syndr*. 2004;37(4):s204-14.

Shtarkshall, R., & Soskolne, V. Migrant populations and HIV/AIDS: The development and implementation of programmes: theory, methodology and practice. UNESCO UNAIDS. 2000.

Soskolne V, Shtarkshall RA. Migration and HIV prevention programmes: Linking structural factors, culture, and individual behaviour--an Israeli experience. *Soc Sci Med*. 2002;55(8),1297-1307.

Strickland, CJ. Challenges in Community-Based Participatory Research Implementation: Experiences in Cancer Prevention with Pacific Northwest American Indian Tribes. *Cancer Control*, 2006;13:230-236.

U.S. Census Bureau. State and county quick facts, Homestead, Florida. Data derived from Population Estimates, 2000. Available at:

<http://quickfacts.census.gov/qfd/states/12/1232275.html>

Vega WA, Rodriguez MA, Gruskin, E. Health disparities in the Latino population. *Epidemiologic Reviews*. 2009;31:99-112.

Wallerstein N. Powerlessness, empowerment, and health: Implications for health promotion programs. *Am J Health Promot*. 1992;6:197–205

Wallerstein N, Baker R. Labor education programs in health and safety. *Occup Med State Art Rev*. 1994; 9:305–320.

Weatherby NL, McCoy HV, Bletzer KV, et al. Sexual activity and HIV among drug users: Migrant workers and their sexual partners in southern Florida. *Florida Journal of Public Health*. 1995;7(1):22-26.

Weatherby NL, McCoy HV, Bletzer KV, et al. Immigration and HIV among migrant workers in rural southern Florida. *J Drug Issues*. 1997;27(1):155-72.

**CHAPTER 3**

**DEVELOPMENT AND CULTURAL ADAPTATION**

**OF AN HIV PREVENTION INTERVENTION<sup>2</sup>**

**3.1 Abstract**

Despite the unique and challenging circumstances confronting Latino migrant worker communities in the U.S., debate still exists as to the need to culturally adapt evidence-based interventions for dissemination with this population. Project Salud adopted a community-based participatory research model and utilized focus group methodology with 83 Latino migrant workers to explore the relevance of culturally adapting an evidence-based HIV prevention intervention to be disseminated within this population. Findings from this study indicate that, despite early reservations, Latino migrant workers wanted to participate in the cultural adaptation that would result in an intervention that was culturally relevant, respectful, responsive to their life experiences, and aligned with their needs. This study contributes to the cultural adaptation/fidelity debate by highlighting the necessity of exploring ways to develop culturally adapted interventions characterized by high cultural relevance without sacrificing high fidelity to the core components that have established efficacy for evidence-based HIV prevention interventions.

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### **3.2 Introduction**

Understanding and addressing the causes of HIV related health disparities among Latinos in the U.S. is increasingly relevant as the magnitude of immigrant and migrant populations from Latin America and the Caribbean continue to grow (US Census Bureau, 2012). The Latino community living in the United States has been disproportionately impacted by the HIV/AIDS epidemic (CDC, 2011), while the development, implementation, and evaluation of HIV prevention interventions designed to reduce the risk of infection among Latinos lags behind prevention efforts targeting other communities (CDC, 2011). This public health gap is particularly apparent when considering the sparse attention received by Latino migrant workers in the United States despite their high risk for HIV infection. Research indicates that most Latino migrant workers (LMWs) become infected while in the U.S., underlining the importance of enhancing both HIV prevention and treatment efforts (Sheldin et al., 2005).

Research has specifically linked migration to increased HIV incidence and vulnerability in a variety of contexts and places. A greater risk for poor health and limited access to health services, low socioeconomic status, low levels of formal education, and marginalization are among the main reasons why LMWs are particularly vulnerable to HIV infection (Soskolne & Shtarkshall, 2002; Shtarkshall & Soskolne, 2000). The few available studies on HIV transmission and prevention specifically conducted among Latino migrant workers highlight the role played by many complex and interrelated factors. These include social norms, health-related beliefs, attitudes and behaviors related to sex and drug use, and social and environmental factors such as housing and employment (Organista et al., 1998; Aranda-Naranjo & Gaskins, 1998; Fernandez et al., 2004; Hernandez et al., 2004; Sanchez et al., 2004). LMWs bring with

them an assortment of beliefs, attitudes, and practices that vary from country to country of origin and that—when put into practice in their new communities—often result in a sense of cultural shock, stress, and alienation that may impact health-risk behaviors, in general, and HIV related risk behaviors in particular. The development of effective HIV prevention interventions for the Latino migrant worker community requires that we address the cultural and societal issues that put LMWs at risk as well as focus on the cultural strengths that might assist members of this community to stay safe.

While the existing studies have made a critical contribution to advance our understanding of the Latino migrant worker population in the US and highlight numerous potential differences between this and other populations, their HIV prevention interventions have demonstrated only limited effectiveness (Mishra & Conner, 1996; Weatherby et al., 1995; McCoy et al., 1998) and documented a critical need for tailoring effective HIV prevention interventions for the Latino migrant worker population. These adaptations, however, cannot be limited to the cultural translation of existing interventions based on cultural generalizations or preconceptions associated with Latinos (Kumpfer et al., 2002; Bernal & Saez-Santiago, 2006). A pervasive limitation of many of these cultural translations involves the use of the umbrella category “Latino” (or “Hispanic”) which presents an obfuscated description that pretends to capture the characteristics of a large group of national and ethnic populations. Another important limitation is the imposition of the term “Latino” on different subgroups with different characteristics, backgrounds, and migration experiences without asking members of these groups for their opinion. These limitations contribute to the traditional mistrust among LMWs of conventional research which they view as paternalistic, misguided, and irrelevant to their needs.

As a result, conventional prevention strategies are likely to fail to adequately help Latino migrant workers to adopt and maintain HIV risk reduction behaviors in a constantly shifting personal and social environment (McCoy et al., 1999; Weatherby et al., 1997; Rao et al., 2008). Culturally adapted interventions must prompt community engagement and participation at every phase of the program if they do not want to remain culturally blind. Latino migrant workers are most likely to benefit from HIV prevention efforts when these efforts are supported at the community level, sustained over time, and the overall needs of the community are addressed (Organista et al., 2002; Vega et al., 2009; Arcury et al., 1999).

Community based participatory research (CBPR) has emerged as a research paradigm that addresses the limitations of conventional research models and offers a "collaborative approach to research that equitably involves all partners in the research process and recognizes the unique strengths that each brings. The ultimate goal is to promote social change to improve community health and reduce health disparities" (Minkler & Wallerstein, 2008). Advantages of CBPR include that it is a participatory and cooperative approach, requires equitable power and mutual ownership, is framed in a co-learning experience, and seeks the balance between research and action. Furthermore, it is an empowering process that involves capacity building among all partners involved.

In this paper, we describe (a) Project Salud, a growing CBPR partnership between the Latino migrant worker community in South Florida and researchers at Nova Southeastern University and Florida International University; and (b) the value of using focus groups with the Latino migrant community in South Florida to culturally adapt an evidence-based HIV prevention intervention before implementation in the community.

### **3.3 Methods**

Project Salud--officially entitled "HIV Risk Reduction among High Risk Latino Migrant Workers in South Florida"--was a 4-year major study funded by the National Institute on Minority Health and Health Disparities (NIMHD) as part of C-Salud, a P20 Exploratory Center of Excellence at Florida International University. The main objective of Project Salud was to assess the differential effectiveness of an Adapted Stage-Enhanced Motivational Interviewing (A-SEMI) compared to a Health Promotion Comparison (HPC) condition for producing long-term reductions in HIV risk and increased health behaviors among LMWs. The design of the A-SEMI intervention is considered to be an enhancement over existing cognitive behavioral risk reduction approaches because A-SEMI integrates key contextual components from effective HIV prevention interventions (i.e., peer counseling) linked to maintenance of risk reduction effects. As described in this paper, the A-SEMI intervention was culturally adapted in collaboration with the LMW community.

Project Salud was conceived as a CBPR project with the goal of engaging the Latino migrant worker community in Homestead in the implementation of an HIV prevention intervention. By framing Project Salud within the CBPR approach, this study responded to the NIH priority on establishing equitable partnerships between community members and researchers with the final goal of increasing community participation in the research process, improving community health, and reducing HIV-related health disparities.

### *Study Design*

At the early stages of Project Salud, we set off a plan to address the issue of cultural adaptation while reinforcing trust in the community and creating community capacity as a key building block in the development of our partnership with the Latino migrant worker community. We initiated a dialogue with key community partners and community members with the goal of identifying what type of strategies would be adequate to address the issue of HIV prevention among Latino migrant workers. The ultimate goal of this dialogue was to juxtapose the views of both the community and the researchers. Based on this exchange of ideas and using other researchers' experiences as a learning framework (Rhodes et al., 2006; Andrews et al., 2010; Eisinger & Senturia, 2001), we decided that focus group methodology was the appropriate approach. Researchers who work with migrant populations have reported on the complexities of working with these populations and how a unique sensitivity is required to understand how particular phenomena are experienced and expressed (Hughes & DuMont, 1993). Focus groups provide several advantages over the conventional methods in instrument development. First, focus groups are useful for developing insights into the perceptions and points of view of persons who have some common characteristics related to the research topic and for appreciating the variation in people's experiences (Morgan, 1993). The resulting intervention is more likely to be grounded in the experiences of the population under study. Generating knowledge from focus groups can provide reasonable assurance that the instrument is culturally anchored. Second, focus groups inform researchers about the language and terminology that particular groups of people use regarding the construct under study (Morgan, 1993). By preserving the terminology from the focus group, items included in the intervention

may reflect the language of the population of interest. Third, the focus group's social nature often stimulates stories and insights that would be missed otherwise (Asbury, 1995).

Focus groups were conducted at the early stages of Project Salud when both the project and the researchers involved in it were still unknown to many community members. We undertook a series of preparatory activities prior to conducting the focus groups to better inform the Latino migrant worker community in Homestead about who we were, the goals of the project, and our desire to establish a true partnership with the community. As part of these preparatory steps, we conducted several town hall meetings at venues such as churches, street markets, a community center, and the offices of the Farmworker Association of Florida in Homestead. We expanded our partnership with professionals in health and social services, advocates, religious leaders, AIDS educators and, more importantly, nursery and agricultural workers. As our partnership grew larger and stronger, Project Salud started being recognized in the community.

Another positive outcome of our increasing presence and recognition in the community resulted in the implementation of strategies that increased recruitment rates and representativeness. Community members' concerns about becoming involved in a focus group began to dissipate during town hall meetings and the different activities conducted at the early stages of the project. The support of community partners was crucial at a time when the current anti-immigration climate and policies in the U.S. have negatively impacted the lives of migrant workers. We addressed this issue by validating such concerns and extensively reviewing the standards of confidentiality and the rights of each participant (i.e., right to withdraw from the study at any time, right to refuse to answer questions). We also adopted community members'

suggestions regarding the locations where we could meet and conduct the focus groups. The suggested sites--unlike some of the locations we had originally preselected--were considered by the community as safer and less likely to be raided by immigration authorities.

To be selected for the focus groups, participants had to (a) be 18 years old or older; (b) be a first generation immigrant; (c) be a member of the Latino migrant worker community in the Homestead area; and (d) express an interest to participate in the focus group interview.

A total of eight focus groups were conducted with a range of 6 to 12 participants per focus group. A maximum number of 12 participants per group was established in order to better facilitate group discussions. Each focus group interview lasted between 120 and 180 minutes and was held in the evening and/or weekend. All focus groups started with a dinner, an overview of Project Salud, completion of a consent form, and brief demographic questionnaire. Each participant received a \$40 stipend for their participation. Participants were required by IRB policy to complete a form documenting their receipt of the participant payment; however, no personal identifiers were requested.

Eighty-three members of the Latino migrant worker community participated in the focus groups. Although it was planned in the original research protocol to organize focus groups according to a set of criteria (i.e., gender, nationality, age), the design was modified in response to the contextual challenges associated with recruitment. In particular, participants were encouraged to join whichever focus group was possible for them to attend.

Focus groups were consistent in their delivery and draw upon the same protocol guidelines. Each session was facilitated by a project member with experience in focus group

facilitation while another project member was present at each session as a note-taker. Focus groups were conducted in Spanish and the discussions were audio recorded and then transcribed for purposes of data analysis. Prior to conducting the focus groups, we hired two members from the LMW community to be trained on the project, assist with the development of the focus group protocol, and support focus group sessions.

Project Salud members introduced themselves and provided a five to ten minute overview of the project. Project members made this presentation highly interactive as a means to warm up the focus group participants. For instance, they included a trivia or guessing game as part of the presentation. Group members introduced themselves and were invited to briefly express an opinion on the impact of the HIV/AIDS epidemic on their community. This initial discussion provided a context for the group from which to proceed. Participants were told that focus groups were being held in order to learn from the Latino migrant worker community about their knowledge, behaviors, and attitudes towards the HIV/AIDS epidemic. They were also inquired about their interest in participating in a study that would utilize the information learned from the focus groups to determine how the different intervention components should be adapted and implemented in order to increase community members' motivation to participate in this initiative and establish a sustainable strategy for implementing the adapted intervention in the community.

Project Salud members explained that the research team sought to offer an existing evidence-based HIV prevention intervention to the LMW community that had proven beneficial to other communities. Therefore, the focus group sessions were a key step toward clarifying how relevant LMWs find the specific core components (i.e., skills) covered in the original

intervention, exploring if the intervention was responsive to their life experiences and cultural background, and making the necessary cultural adaptations. The ensuing discussion followed the protocol guidelines tailored to explore and discuss the core components of the evidence-based intervention.

### **3.4 Results**

Using focus groups proved to be a challenging but successful experience that provided many insights into culturally shaping the A-SEMI intervention. In this section, a few examples are offered on the type of knowledge that was gathered through the implementation of the focus groups as well as how that information was utilized towards the cultural adaptation of the intervention.

Talking about HIV-related behaviors, attitudes, and beliefs in a group setting can be extremely difficult for Latino men and women who view topics such as sexual behaviors as very personal. Because of this, we found that some participants would talk about these issues as if they were happening to a friend or relative. On the other hand, we also concluded that—although less private—the use of oral and group-centered strategies were more reflective of the dominant learning styles, orientations, values and educational levels of participants. As a result, although an interventionist would typically encourage participants to talk about their own experiences and opinions, we agreed that when working with the LMW community, we needed to be aware that—in some instances—one strategy to cope with the discomfort of talking about personal issues is to frame it as the experience of someone else.

The focus groups also revealed the need for a more dynamic understanding of the cultural milieu that characterizes Latino migrant worker communities. An example of how sweeping assertions about Latino culture fail to capture the shifting cultural dynamics of this community is reflected in the impact of changing gender roles on sexual relations. Traditional gender roles are often associated with Latino culture. Machismo and marianismo are presented as playing a crucial role in shaping sexual communication and relations between Latino men and women (Vanoss, 2003). Because of the apparent power imbalance that characterizes these relationships, some scholars suggest that theories that emphasize sexual division of labor and power may be an appropriate intervention framework. However, our focus groups revealed that—although often times this power imbalance may have characterized participants’ sexual relations in their countries of origin—as LMWs spend more time away from their countries of origin, they begin to reconsider those gender role expectations. This trend was particularly salient among the women who participated in the focus groups. Having to endure the same harsh working and housing conditions as their male counterparts, Latina migrant workers question the traditional idea of the submissive Latina who centers her life around her family and is generally obedient to the men in her life. As a result, sexual culture in the LMW community can be characterized as the coexistence of traditional and modern values. In light of this finding, it was crucial to culturally adapt the A-SEMI intervention to reflect the coexisting cultural expectations and rules of sexual interaction among LMWs.

Another salient value associated with traditional Latino culture is familismo, which places the multigenerational extended family at the core of the culture. Familismo promotes closeness and interconnectedness among extended family members and provides a sense of

responsibility to care for all members of the family (Vanoss, 2003). Most of the participants in the focus groups had few or no relatives living with them in the U.S. Many of the male participants indicated that they came to the U.S. by themselves and would not risk bringing their families over because of the risks associated with getting smuggled into the U.S. Other participants indicated that their spouses or significant others had been deported back to their countries of origin and, in most cases, were trying to cross the border again. As a result, the positive impact provided by familismo in terms of social support, knowledge, and material resources is lacking in the LMW community. In its absence, participants stressed the importance of developing a sense of community. Participants highlighted the importance of facilitating learning experiences by promoting a sense of community among those who would participate in the intervention. Specifically, rather than limiting group interventions to didactic sessions focused exclusively on disseminating knowledge and teaching skills, participants affirmed that interventions should also promote group cohesion and supportive relationships among intervention participants. Many participants in the focus groups commented on how valuable the focus group session was to them, as well as their desire to extend the same type of dynamic into the intervention. Participants expressed that the intervention groups should constitute a resource for empowering participants. Consequently, the A-SEMI intervention was culturally adapted to enhance empowerment as a multilayered process beyond the cultural domains directly related to HIV prevention (i.e., sexual relations).

### **3.5 Discussion**

This study contributes to the existing literature in relevant ways. For instance, the narratives shared by members of the Latino migrant worker community provide additional evidence of their resistance to participate in conventional research which they perceive as paternalistic, abusive, and irrelevant to their needs. Overcoming their traditional mistrust and engaging the LMW community was paramount for the success of Project Salud.

Culturally adapted interventions must prompt community engagement and participation at every phase of the program if they do not want to remain culturally blind. Findings from this study underscore the strong desire of LMWs in the Homestead community to participate in HIV prevention interventions and highlight the importance for interventions to be culturally relevant, respectful, and responsive to their life experiences. In particular, it is important to adapt interventions according to relevant Latino cultural values and experiences specific to the Latino group under consideration instead of just relying on sweeping generalizations about Latino culture. Participants in this study emphasized that interventionists needed to communicate to community members a genuine understanding of the contextual challenges that impact their lives, help them to address barriers to participation, and constantly promote a dialogue aimed at examining the cultural relevance of the intervention. For instance, participants conveyed the importance of promoting a sense of empowerment and community among participants taking part in the intervention and emphasized the important role this could play given that many of the participants were not living with their families. Thus, interventions that rely primarily on dyadic instruction between the interventionist and community member may be of limited appeal to the

LMW community. Instead, culturally relevant interventions for LMWs should facilitate a group learning experience that promotes trust, social support, and empowerment.

We also believe that present findings also contribute in a significant way to the cultural adaptation/fidelity debate. While cultural adaptation scholars argue that evidence-based interventions should be culturally adapted before dissemination (Castro et al., 2004), fidelity advocates consider that the need for cultural adaptation has been overstated (Elliot & Mihalic, 2004). Researchers have also expressed that modifying existing interventions may reduce or eliminate the impact of the core components of original interventions (Elliot & Mihalic, 2004). While Project Salud recognizes the need to respect the core components of the original intervention that proved to be efficacious, we agree with those who underscore the importance of attending to the cultural values and traditions that target populations consider to be most relevant in their lives without relying on theoretical preconceptions associated with specific ethnic minority populations (Griner & Smith, 2006). Focus group participants understood the need to balance the cultural relevance of the intervention with the need for intervention fidelity. As a result, we believe A-SEMI can be considered what some researchers (Castro & Hernandez-Aaron, 2002) refer to as a hybrid model that bridges the need for rigorous scientific research with the needs for cultural relevance in terms of intervention content and delivery.

### **3.6 Conclusions**

Statistical analyses are being conducted on the effects of the A-SEMI intervention on HIV prevention in the LMW community (Chapter 4). Consequently, we cannot evaluate

whether the culturally adapted components and delivery of the A-SEMI intervention increased efficacy. However, we can attest to the positive impact of engaging the LMW community in a CBPR process in which the beneficiaries of the proposed intervention can identify the values, traditions, and cultural experiences that are most relevant to their lives.

Community members participating in the focus groups that led to the cultural adaptation of the A-SEMI intervention recognized the significance of being invited to help with the design of an HIV prevention intervention. They expressed a sense of being empowered with a voice in the design of a science-based prevention program that also fits the LMW community's traditions, values, and needs. We have also observed an increase in community awareness and in the number of members of the Latino migrant worker community who have approached Project Salud staff or any of our community partners asking about testing, resources, and referrals as a result of coming in contact with Project Salud. As evidence of the added benefit of their contribution to health promotion and disease prevention in their community continues to mount, Latino migrant workers can and should become key players toward the implementation of any CBPR-based project in the Latino migrant population of South Florida.

## REFERENCES

Andrews OJ, Newman DS, Meadows O, et al. Partnership readiness for community-based participatory research. *Health Educ Res* 2010; PMID: 20837654.

Aranda-Naranjo B, Gaskins S. HIV/AIDS in migrant and seasonal farm workers. *J Assoc Nurses AIDS Care* 1998;9(5):80-3.

Arcury TA, Austin CK, Quandt SA, et al. Enhancing community participation in intervention research: farmworkers and agricultural chemicals in North Carolina. *Health Educ Behav* 1999; 26(4):563-78.

Asbury, J. Overview of focus group research. *Qual Health Res* 1995;5:414-20.

Bernal G, Saez-Santiago. Culturally centered psychosocial interventions. *J Comm Psych* 2006;34:121-32.

Castro FG, Hernandez-Aaron E. Integrating cultural values into drug abuse prevention and treatment with racial/ethnic minorities. *J Drug Issues* 2002;32:783-810.

Castro FG, Barrera M, Martinez CR. The cultural adaptation of prevention interventions: Resolving tensions between fidelity and fit. *Prev Sci* 2004;5:41-5.

Centers for Disease Control and Prevention. HIV among Hispanic/Latino. 2010. Available at: <http://www.cdc.gov/hiv/hispanics/index.htm>

Centers for Disease Control and Prevention. HIV Behavioral Interventions for Hispanics/Latinos in the US: A Meta-Analytic Review. 2007. Available at:

[http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst\\_latinoconsult.pdf](http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst_latinoconsult.pdf)

Census Briefs 2010. The Hispanic population: 2010. Accessed 2011 November 14. URL: <http://www.census.gov/prod/cen2010/briefs/c2010br-04.pdf>

Deren S, Sheldin M, Decena CU, Mino M. Research challenges to the study of HIV/AIDS among migrant and immigrant Hispanic populations in the United States. *J Urban Health* 2005;82(2):iii13-25.

Eisinger A, Senturia KD. Doing community-driven research: A description of Seattle partners for healthy communities. *J Urban Health* 2001;78(3): 519-34.

Elliot DS, Mihalic S. Issues in disseminating and replicating effective prevention programs. *Prev Sci* 2004;5:47-53.

Fernandez MI, Collazo JB, Hernandez N, et al. Predictors of HIV risk among Hispanic farm workers in South Florida: women are at higher risk than men. *AIDS Behav* 2004;8(2):165-74.

Griner D, Smith TB. Culturally adapted mental health interventions: A meta-analytic review. *Psychother* 2006;43:531-48.

Hernandez MT, Lemp GF, Castañeda X, et al. HIV/AIDS among Mexican migrants and recent immigrants in California and Mexico. *J Acquir Immune Defic Syndr* 2004; 37(4): 203-17.

Hughes D, DuMont K. Using focus groups to facilitate culturally anchored research. *American J Comm Psych* 1993;21: 775-806.

Kumpfer KL, Alvarado R, Smith P, Bellamy N. Cultural sensitivity in universal family-based prevention interventions. *Prev Sci* 2002;3: 241-4.

McCoy HV, McCoy CB, Lai S. Effectiveness of HIV interventions among women drug users. *Women Health* 1998;27(1-2):49-69.

McCoy HV, McCoy CB, Lai S, et al. Behavior changes among crack-using rural and urban women. *Subst Use Misuse* 1999;34(4-5): 667-84.

Minkler M, Wallerstein N. eds. *Community-based participatory research for health: From process to outcomes*. 2nd Ed. San Francisco, CA: Jossey-Bass, 2008.

Mishra SI, Conner RF. Evaluation of an HIV prevention program among Latino farmworkers. In Mishra SI, Conner RF, Magaña JR, eds. *AIDS crossing borders: The spread among migrant Latino*. Colorado: Westview Press, 1996.

Morgan, DL. *The focus group guidebook*. Thousand Oaks, CA: Sage, 1993.

Organista PB, Organista KC, Soloff PR. Exploring AIDS-related knowledge, attitudes, and behaviors of female Mexican migrant workers. *Health Soc Work* 1998;23(2):96-103.

Organista KC, Carrillo H, Ayala G. HIV prevention with Mexican migrants. Review, critique and recommendations. *J Acquir Immune Defic Syndr* 2004;37(4):S227-39.

Rao P, Hancy K, Velez M, et al. HIV/AIDS and farmworkers in the US. *Farmworker Justice*, 2008.

Rhodes SD, Hergenrather KC, Montañó J, et al. Using community-based participatory research to develop an intervention to reduce HIV and STD infections among Latino men. *AIDS Educ Prev* 2006;18(5):375-89.

Sanchez MA, Lemp GF, Rodriguez-Magis C, Bravo-Garcia W, Carter S, Ruiz JD. The epidemiology of HIV among Mexican Migrants and recent immigrants in California and Mexico. *J Acquir Immune Defic Syndr* 2004;37(4):s204-14.

Shtarkshall, R., & Soskolne, V. Migrant populations and HIV/AIDS: The development and implementation of programmes: theory, methodology and practice. UNESCO UNAIDS, 2000.

Soskolne V, Shtarkshall RA. Migration and HIV prevention programmes: Linking structural factors, culture, and individual behaviour--an Israeli experience. *Soc Sci Med* 2002;55(8):1297-1307.

Vanoss Marin, B. HIV prevention in the Hispanic community: Sex, culture, and empowerment. *J. Transcultural Nursing* 2003;14(3):186-92.

Vega WA, Rodriguez MA, Gruskin, E. Health disparities in the Latino population. *Epidemiol Rev* 2009;31:99-112.

Weatherby NL, McCoy HV, Bletzer KV, et al. Sexual activity and HIV among drug users: Migrant workers and their sexual partners in southern Florida. *Florida Journal of Public Health* 1995;7(1):22-6.

Weatherby NL, McCoy HV, Bletzer KV, et al. Immigration and HIV among migrant workers in rural southern Florida. *J Drug Issues* 1997;27(1):155-72.

## CHAPTER 4

### TESTING THE EFFICACY OF A CULTURALLY ADAPTED HIV PREVENTION INTERVENTION<sup>3</sup>

#### 4.1 Abstract

Project Salud evaluates the efficacy of a community-based intervention to reduce risk behaviors and enhance factors for HIV-preventative behaviors. A randomized controlled trial of 278 high risk Latino migrant workers was conducted between 2008 and 2010. Participants completed an audio computer assisted self-interview questionnaire at baseline and 3- and 9-month post-intervention follow-ups. Participants were randomly assigned to the community-based intervention (A-SEMI) or the health promotion condition (HPC). Both interventions consisted of four 2.5-hour interactive sessions and were structurally equivalent in administration and format. Relative to the comparison condition, A-SEMI participants reported more consistent condom use, were less likely to report never having used condoms, and more likely to use condoms at last sexual encounter during the past 90 and 30 days. A-SEMI participants also experienced a positive change in regard to factors for HIV-preventative behaviors over the entire 9-month period. Our results support the implementation of community-based, culturally tailored interventions among Latino migrant workers.

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## **4.2 Introduction**

At 16.7% of the US population, Latinos are the largest and fastest growing ethnic minority in the US (US Census Bureau, 2012). The Latino community living in the United States has been disproportionately impacted by the HIV/AIDS epidemic. The CDC estimates that Latinos accounted for 20% of new HIV infections in 2009 while they represented 16% of the US population. In 2009, Latino men accounted for 79% of new infections among all Latinos and the rate of new infections among Latino men was two and a half times as high as that of white men (39.9 per 100,000 vs. 15.9 per 100,000). While Latina women accounted for 21% of new infections among Latinos in 2009, their rate of HIV infection was more than four times that of white women (11.8 per 100,000 vs. 2.6 per 100,000) (CDC, 2010).

Despite this alarming epidemiologic trend, the development, implementation, and evaluation of HIV prevention interventions designed to reduce the risk of infection among Latinos lags behind prevention efforts targeting other communities (CDC, 2008). This public health gap is even more evident when considering the sparse attention received by Latino migrant workers (LMWs) in the U.S. despite their high risk for HIV infection. Research has specifically linked migration to increased HIV incidence and vulnerability in a variety of contexts and places. First, migrant workers are a large and growing population with an estimated five million people living and working in the US. Second, migrant populations have a greater risk for poor health in general and HIV infection in particular due to circumstances including their economic transitions, decreased accessibility of health services, and the complication of the host country health systems to address the needs of migrants. Third, the uniqueness of migrants often foster a kind of ethnic/racial intolerance, and hostility by the host

community which is likely to be even more severe with HIV-positive migrants, particularly regarding stigmatization and discrimination. Thus, migrants may further hide their HIV status as long as possible, thus making support services unavailable for them. Fourth, even if health providers were prepared to assist migrant populations, they would likely encounter great difficulties to reach out to them. Many migrants live in constant fear of deportation, having no stay or work permit for the host country. Therefore, any contact with official government agencies increases that fear and is often accompanied by suspicion. Finally, compared to migrant worker populations in other areas of the United States, workers in the southeastern United States are more likely to live away from their families while doing farm and nursery work (Soskolne & Shtarkshall, 2002; Shtarkshall & Soskolne, 2000).

The few available studies on HIV transmission and prevention specifically conducted among LMWs highlight the role played by risk factors such as inadequate or incorrect HIV transmission knowledge, limited access to HIV risk reduction information, unprotected sexual practices, alcohol and other drug use, cultural and gender roles, and immediate survival problems (i.e., housing and employment) (Organista et al., 1998; Aranda-Naranjo & Gaskins, 1998; Fernandez, et al., 2004; Hernandez et al., 2004; Sanchez et al., 2004). While these studies have made a critical contribution to advance our understanding of the Latino migrant population in the U.S. and highlight numerous potential differences between this and other populations, their HIV prevention interventions have demonstrated only limited effectiveness and documented a critical need for tailoring effective HIV prevention interventions for the Latino migrant population (Mishra & Conner, 1996; Weatherby et al., 1995; McCoy et al., 1998; McCoy et al., 1999; Weatherby et al., 1997). These adaptations, however, cannot be limited to

the cultural translation of existing interventions as they would not be responsive to the cultural uniqueness of Latino migrant populations. The development of new interventions to address HIV prevention in Latino migrant communities needs to take into account their specific circumstances as well as their traditional mistrust of conventional research which they view as paternalistic and irrelevant to their needs. Consequently, culturally adapted interventions must prompt community engagement and participation at every phase of the program if they do not want to remain culturally blind. Latino migrant workers are most likely to benefit from HIV prevention efforts when these efforts are supported at the community level, sustained over time, and other needs in the community are also addressed. The purpose of this article is to extend current knowledge about sexually related risk factors for HIV infection and report on the efficacy of a community based HIV prevention pilot intervention in reducing risky sexual behaviors and enhancing factors (i.e., HIV knowledge) for HIV-preventive behaviors among Latino migrant workers.

Project Salud--officially entitled "HIV Risk Reduction among High Risk Latino Migrant Workers in South Florida"--was a 4-year study funded by the National Institute on Minority Health and Health Disparities as part of C-Salud, a P20 Exploratory Center of Excellence at Florida International University. Project Salud was conceived as a community based participatory research (CBPR) project with the goal of engaging the LMW community in the Homestead/Florida City area in the development and implementation of a culturally tailored HIV prevention intervention. By framing Project Salud within the CBPR approach, this study responded to the NIH priority on establishing equitable partnerships between community members and researchers with the final goal of increasing community participation in all stages

of the research process, improving community health, and reducing HIV-related health disparities.

The main aims of Project Salud was to assess the differential efficacy on an Adapted Stage-Enhanced Motivational Interviewing (A-SEMI) compared to a Health Promotion Comparison (HPC) condition for producing reductions in HIV risk and increased health behaviors among LMWs. The design of the A-SEMI intervention is considered to be an enhancement over existing cognitive behavioral risk reduction approaches because A-SEMI integrates key contextual components from effective HIV prevention interventions (i.e., peer counseling) linked to maintenance of risk reduction effects. The A-SEMI intervention was culturally adapted in collaboration with the LMW community. Eight focus groups consisting of eighty-three community members and key community partners were conducted at the offices of the Farmworker Association of Florida (FWAF) to discuss the factors that increased their HIV risks. Data obtained from the focus groups along with the existing body of literature informed the development of a culturally tailored intervention (A-SEMI) that reflected their cultural background, living conditions, lifestyle, and was likely to be adopted by the community (Sanchez et al., 2012).

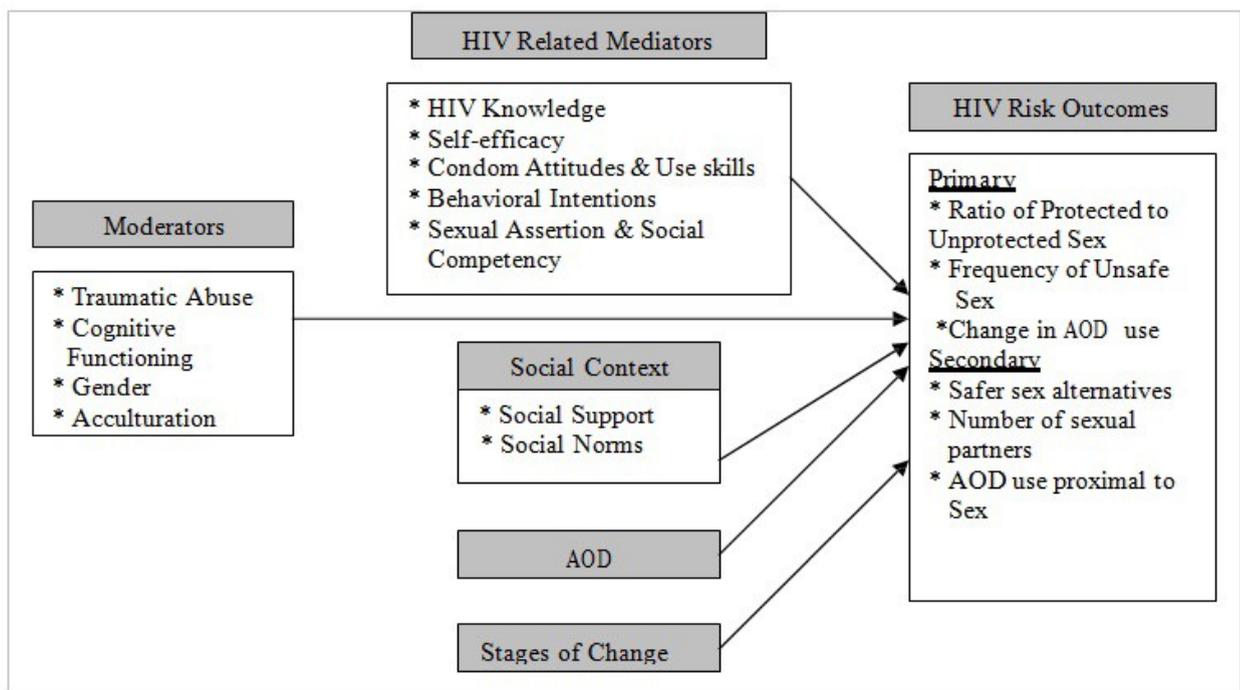
Focus groups provide several advantages over the conventional methods in instrument development. First, focus groups are useful for developing insights into the perceptions and points of view of persons who have some common characteristics related to the research topic and for appreciating the variation in people's experiences (Morgan, 1993). The resulting intervention is more likely to be grounded in the experiences of the population under study. Generating knowledge from focus groups can provide reasonable assurance that the instrument

is culturally anchored. Second, focus groups inform researchers about the language and terminology that particular groups of people use regarding the construct under study (Morgan, 1993). By preserving the terminology from the focus group, items included in the intervention may reflect the language of the population of interest. Third, the focus group's social nature often stimulates stories and insights that would be missed otherwise (Asbury, 1995). Focus groups also reinforced the importance of getting community members involved in all stages of the study. Accordingly, we initiated a training program to train community members as community health workers (CHWs). Two CHWs played a key role as outreach workers and interviewers while four different CHWs delivered both interventions. A detailed description of this training program is described in a recently published article (Sanchez et al., 2012) (See Chapter 2).

Given the heuristic value of theoretical models in developing effective prevention procedures, the design of the A-SEMI intervention was guided by Information-Motivation-Behavior Theory (IMB) (Fisher & Fisher, 1992) and the Transtheoretical Model (Prochaska et al., 1992) in focusing on attitudes, motivations, and skills factors most often hypothesized to mediate HIV transmission risk reduction. The intervention design was also guided by theoretical and empirical work emphasizing the importance of Social influence (Social Norms, Social Support and Service Utilization) factors (Neaigus et al., 1994). Given our target population, we view the maintenance of HIV prevention effects to depend significantly on reducing exacerbation/relapse of behaviors such as transient sex and alcohol and other drug use and that it is particularly important to be addressing these problems with a greater and more sustained effort for prolonging the success of HIV prevention interventions. Additional moderating

variables (e.g., acculturation, cognitive functioning, and trauma abuse history) are also viewed as crucial in tailoring assessment and intervention for this population; as such variables have been shown to increase susceptibility to HIV risks (Bandura, 1994; Shtarkshall & Soskolne, 2000). Figure 2 graphically depicts our specific aims, which are elaborated in the text that follows.

**Figure 2. Conceptual Model**



The A-SEMI intervention is an updated, enhanced, and adapted version of the traditional cognitive-behavioral intervention (CBI) enhanced with Peer Education and Motivational Counseling. It is designed to produce a stronger, more sustained HIV risk reduction effect

among high risk LMWs. Two trained community health workers delivered A-SEMI in Spanish during four 2.5-hour interactive group sessions that took place at the FWAFF office in Homestead, FL on two consecutive weekends. Based on their schedule, group participants decided whether they wanted to have two sessions—one in the morning and one in the afternoon—on the same day (i.e., Sunday) or on different days (i.e., one session on Saturday and another session on Sunday). On average, each group was composed of six participants.

The first session focused on developing group cohesion, HIV education, motivational enhancement, and goal setting. Study subjects were helped in developing a specific and relevant personal risk-reduction plan that could be realistically accomplished with a sense of mastery and success. The second session focused on identifying high-risk situations, and negotiation skills through problem solving, assertiveness and communication training approaches that included the principles of the ABC (abstinence, be faithful, use a condom) approach to HIV prevention. During these sessions, the group was focused on identifying and discussing recent high-risk situations and successes and difficulties in avoiding transient and unsafe sex. Session 2 pursued these skills within the context of coping with the exacerbation of alcohol and other drug use (AOD) and other problems. While A-SEMI is a refinement and adaptation of CBI, it was condensed into four sessions in order to adhere to feasibility considerations. Given the strong link between AOD use and HIV risk, we had considered lengthening the A-SEMI and/or adding booster sessions to address these problems. We rejected this option, however, because of the overriding priority on designing streamlined and parsimonious interventions that would be more feasible to implement, adapt, export and generalize to diverse, resource-limited community settings. Instead, we decided to integrate into A-SEMI, a Peer Counseling Intervention

Component (PCIC), which has been shown to be effective in adult and adolescent populations (e.g., illicit drug injectors), and other life problems. As such, PCIC effects may be more prolonged and sustained than would be expected from simply adding more sessions. This is because the contacts with interventionist (peer counselor) are not time limited as are additional sessions, or constrained by group organization. Ongoing support and reinforcement is important for these distressed LMWs because their mobility exacerbates continuity of health care. Thus arguably it is best to enhance social network support to provide sustained source to continue to reinforce behavior change (as A-SEMI emphasizes), rather than lengthening research interventions that nevertheless come to an end with the conclusion of a study and would only serve as a temporary presence in their lives.

The Peer Counseling Intervention Component has been employed in a number of effective HIV prevention intervention studies (Baldwin, 1995; Latkin, 1998; Pearlman et al., 2002; Morisky et al. 2004; Morisky & Ebin 2000). PCIC is based on considerable research indicating that 1) peers help to create and sustain community links; 2) study subjects often modify their attitudes and behavior to become congruent with their peer's position and 3) learning is enhanced by participants' ability to personalize HIV/AIDS. In a peer-based approach, members of a social group or network communicate with, educate, or counsel members of their own group. The theory of social comparison states that behavior is determined through a comparison of others within one's social network (Festinger, 1954). Social influence processes underlie interventions that use peers as agents of change. The mechanisms of social influence include social norms, network membership, conformity pressures, media influences, social comparison, and modeling. Social influence approaches emphasize behavioral

expectations and social norms present in the environment and prepare the learner to resist pressure to engage in risk-taking behaviors (Morisky & Ebin 2000).

One of the strongest theoretical factors leading to a focus on peer approaches includes peer credibility, in which individuals often identify their peers as frequent, reliable, and preferred sources of information on sexuality-related topics, including STDs and AIDS (Perry & Sieving, 1991; Wren et al., 1997). The peer, demonstrating the behavioral action, can successfully direct individuals toward healthy lifestyles (Bandura, 1977). The practical issue relates to high levels of commitment, energy, and enthusiasm. When motivated for HIV and other sexually transmitted diseases (STDs) prevention and when provided with appropriate support, peers usually wish to share this information with others like them. In other words, peers are more effective teachers than are outsiders (Morisky et al. 2004)

Peer education has been popularly accepted as an important component of HIV risk reduction programs because it typically combines several crucial factors: strong identification of the peer educator with the social and cultural environment of the target group, promotion of positive attitudes and healthy behaviors, and real involvement in the intervention. Peer education can be especially beneficial in connecting with a group that would otherwise be difficult to reach such as migrant workers. Peer educators can distribute condoms and other contraceptives and can cover a broad range of subjects, including friendships and relationships, anatomy and physiology of the reproductive system, appropriate family planning methods, signs and symptoms of sexually transmitted diseases. Peer educators can also demonstrate and participate in condom use training. With high-risk populations, peer education programs have been shown to be less costly per participant than a program based on a professional facilitator model.

Further, peer education not only has an impact on other LMWs, but also on other social network members. The peer educators with acquired skills and knowledge regarding HIV risk reduction are likely to continue to propagate safe sexual behavior in their social environment. Additionally, the participants who actually change their sexual behavior because of the peer approach will also influence others. It has been shown that people participating in a peer educator program share their newly acquired information and skills with others in their immediate environment (Haour-Knipe et al., 1999).

The evidence presented elsewhere indicates that a peer component will be successful among LMWs. In particular, a peer leader was an important influence in the California MW camps where positive behavior change occurred among Hispanics in using condoms (Mishra & Conner, 1996). Group leaders emerged to provide stability in typical MW camps in California, which are comprised of individuals from different towns, regions of Mexico and Central America. Either the group discussions led by a peer or the leader's influence were thought to have contributed to the camps' success in using condoms. Further, Morisky et al.'s (2004) study of HIV/AIDS prevention in the Philippines used adult peer educators who successfully intervened with their coworkers to significantly increase condom use, decrease STDs. Morisky et al (2002) also found consistent condom use in the peer education groups of female bar workers. Both populations are similar to our migrant worker population and give us confidence that this intervention will also be effective.

Motivational Interviewing/Enhancing Therapy (MET) strategies have been integrated into effective interventions for reducing AOD (Miller & Rollnick, 2002) and HIV risk problems. Perhaps because the LMWs often show motivational deficits for enacting and sustaining health

behavior changes, MET has been effectively adapted for AOD-using participants (Kalichman et al., 2001). Existing studies revealed that many LMW participants could demonstrate adequate post-intervention skills and knowledge associated with reducing risk, but lacked the motivation to actually do so. This evidence prompted us to incorporate MET strategies into A-SEMI. One added MET component is the provision of normative feedback. Based on the baseline assessment, normative feedback will be offered to assist A-SEMI participants in identifying reasons for changing HIV attitudes and risk behavior, and in eliciting self-motivating statements. This addition was based on Kalichman's et al. (1999, 2001) adaptation for group administration of the MET normative feedback technique for HIV prevention. The influence of MET is also reflected in A-SEMI, which throughout places great emphasis on actively engaging participants in developing their own risk-reduction strategies and hierarchies of safety, rather than prescribing specific strategies as in a more traditional CBI approach. When participants actively choose and develop risk reduction strategies, this tends to increase personal involvement and the motivation to change (Miller & Rollnick, 2002). For instance, Session 2 began with a brief review of Session 1 during which community health workers had initiated a discussion about ways to prevent HIV infection, including the use of condoms. Groups members were provided with feedback that included their responses to the condom attitude measure collected at baseline. Condom attitudes were discussed via group activities which allowed participants to sort those attitudes into pros and cons of condom use. Community health workers utilized the negative aspects of condom use as examples for the problem-solving skills addressed during session 4.

Our randomized design compared the intervention approach of A-SEMI to HPC, which served as the comparison condition and targeted specific health issues of special relevance to

high risk LMWs. The HPC condition was meant to be educational and didactic, such as common health problems, how to stay healthy, and personal habits related to AOD. Specific topics included prevention skills inclusive of the ABC approach to HIV prevention, first aid, how to treat skin and mouth problems, STDs, and general health strategies such as hygiene and living healthy in crowded conditions. The A-SEMI and HPC were structurally equivalent in administration, time, and format. They also were designed to be of a similar level of interest. Thus, the comparison condition of HPC provided equivalent interventionist attention, expectancy of benefit and issue oriented focus, but did not provide the theory driven techniques of the A-SEMI intervention approach, such as cognitive behavioral skill training specific to AOD and HIV risk reduction. This design controlled for the Hawthorne effect and reduced the likelihood that the effects of the A-SEMI could be attributed to its nonspecific features.

The HPC intervention was not designed to be totally inert as in a placebo, but to represent a realistic level of HIV prevention services that would be received at a typical community program. There are certain methodological advantages and disadvantages to not including any HIV prevention activity in the HPC condition. Ethical concerns precluded us from employing a true placebo condition, but one disadvantage is that overlapping HIV-related components between the A-SEMI and HPC may minimize some potential differences between the conditions. For this type of experimental situation, however, a “standard care” dosage of a needed intervention has been recommended to allow for a conservative estimate of the potency of the proposed experimental condition (Borkovec, 1990, 1993; Borkovec et al., 2001; Carroll et al., 1991). An advantage of including a “treatment as usual dosage level”, as represented by the HIV component, relates to controlling exposure to HIV prevention information among HPC

participants better and ensuring that they received a level of HIV information at least approximate to what is offered at the most typical CBO program. Although some community agencies are providing interventions similar to our HIV component, a number are not. Thus, this feature helps standardize exposure to HIV risk information. Without this exposure, HPC participants might have been more likely to seek out and be exposed to heterogeneous and unequal levels of HIV risk content and concurrent interventions that would complicate our outcome analyses. Moreover, in the absence of such formal exposure for the comparison group, those in the intervention A-SEMI group may have been more likely to perceive the preferences of researchers and accordingly bias their HIV risk outcome reports toward showing changes consistent with intervention goals. Providing an HIV-related standard care component to the HPC participants helped in placing a similar demand on both groups (Kalichman, 1998).

Both interventions were guided by a written manual and held at the same community setting with refreshments/snacks, and with identical compensation for participation. Moreover, equal quality control provisions were used, particularly regarding the need to verify that both interventions were delivered as designed (intervention fidelity), which was stressed during training and at the beginning of each session. All intervention sessions were digitally recorded by a staff member. A structured coding system was created and used to determine fidelity based on the digital recordings. The staff member also took notes during the sessions that were utilized to ensure fidelity. Recordings and notes were reviewed by the project staff and discussed during biweekly meetings to ensure fidelity and provide feedback to project staff.

### **4.3 Methods**

#### **Study Population**

In order to be eligible for the study, potential participants had to meet the following eligibility criteria: 1) be of Latino origin; 2) 18 years of age or older; 3) have a “farm card”; 4) one or more self-reported episodes of unprotected sex in the past three months; 5) willing to be randomized to treatment and contacted for follow-up assessments; 6) likely to be in the general geographic area for six months; and 7) able to understand and provide written informed consent.

From November 2008 through March 2010, outreach workers screened 407 LMWs who were recruited by means of a stratified network-based (snowball) sampling design (Watters and Biernaki, 1989) from neighborhoods and migrant camps in the Homestead/Florida City area in South Florida which is known for its high concentration of LMWs (Figure 3). Of these, 290 (70%) LMWs met eligibility criteria and consented to participate in the study. Of those who were ineligible, 53% were not sexually active or engaged in safe sex all the time, 21% were out of the age range, 16% were not likely to be in the target geographical area, and 10% declined to participate. All data collection and interventions took place in the Homestead office of the FWAF. Transportation and snacks were provided at every session. This study was approved by the IRB Human Subjects Office at Florida International University.

#### ***Procedures***

Assessments were conducted at baseline and at 3- and 9-month intervention follow-ups. Data were collected via an audio computer assisted self-interview (ACASI) with the purpose of

enhancing confidentiality among participants as well as increasing comprehension among participants with low literacy. A project staff member was always available during data collection to assist participants with any questions and/or technical difficulties. Each assessment was conducted in Spanish and took approximately 90 minutes. A project staff member secured the interviews data as soon as participants had finished the assessment. Following the baseline assessment, participants were randomly assigned to the A-SEMI or HPC interventions using a computer generated randomization table. Following each assessment and intervention session, participants received a monetary incentive as approved by the Institutional Review Board.

### Measures

Self-reported consistent condom use, the primary outcome, was defined as use of a condom during every episode of vaginal intercourse in the 30 days and 90 days prior to baseline and at the 3- and 9-month follow-up assessments. We selected consistent condom use during vaginal intercourse as the primary outcome for the study because of its demonstrated effectiveness for HIV transmission (Saracco et al. 1993; De Vicenzi, 1994). We decided to assess vaginal sex based on its significantly higher prevalence at baseline compared to anal sex (only 15.8% of female participants and 4.1% of male participants self-reported having engaged in anal sex during the last 3 months prior to baseline assessment) and its higher risk for HIV infection compared to oral sex (CDC, 2009). Other self-reported behavioral outcomes were never using condoms, and condom use at last sexual encounter. Several techniques were utilized to enhance validity of participants' self-reported sexual behaviors. Calendarizing techniques and consistency checks were utilized to enhance accurate recall.

Psychosocial variables were derived from the underlying theoretical frameworks and a review of the empirical literature. Constructs were assessed using scales with acceptable psychometric previously used in similar studies (Marin BV et al., 1997; Marin BV et al., 1998; Wingood GM & DiClemente RJ, 1998; St. Lawrence et al., 1999; Sikkema et al., 2000). Traditional view of gender roles was measured with a gender roles scale comprising 10 items with higher scores indicating a less traditional view of gender roles ( $\alpha = .70$ ). HIV prevention knowledge was measured using an 8-item scale ( $\alpha = .78$ ) with higher scores indicating greater knowledge about HIV. Perceived barriers to condom use were measured using a 29-item scale with higher scores indicating fewer perceived barriers ( $\alpha = .95$ ). Condom use self-efficacy was measured with a 9-item scale ( $\alpha = .90$ ) reflecting participants' confidence in their ability to properly use condoms with higher scores indicating greater self-efficacy.

### ***Data Analysis***

Analyses were performed using an intent-to-treat protocol in which participants were analyzed in their original assigned study conditions irrespective of the number of sessions attended (Piantadosi, 1997; Pocock, 1993). Baseline differences between participants in the two interventions on sociodemographic, behavioral, and psychological variables with P values of .05 or lower were considered significant for purposes of identifying potential covariates. We assessed differences between interventions with the t test for continuous variables and  $\chi^2$  analysis for categorical variables. Of these variables, only having a primary physician was statistically significant. Overall, the majority of participants (75.5%, n=210) did not have a primary physician. At baseline, 64.3% (n=90) of participants randomized to A-SEMI and 87%

(n=120) of participants randomized to HPC did not have a primary physician. Because of the significant difference between participants in the two interventions in the prevalence of primary physician at baseline ( $P < .001$ ), we included this variable as a covariate in all subsequent data analyses.

We assessed the intervention effects of A-SEMI from baseline to the 3-month follow-up, from the 3-month follow-up to the 9-month follow-up, and for the entire 9-month period from baseline to the 9-month follow-up. We analyzed the intervention effects for each assessment period with logistic regression to compute adjusted odds ratios (AORs) for dichotomous outcomes and linear regression to compute adjusted means and mean differences for continuous variables (Hosmer & Lemeshow, 1989; Kleinbaum et al., 1998). Each regression model included the corresponding baseline measure as a covariate in the analysis as well as a measure of intraclass correlation.

To assess the A-SEMI intervention effects for the entire 9-month follow-up period, we utilized logistic and linear generalized estimating equation regression models to control for repeated within-person measurements (Hardin & Hilbe, 2003; Liang & Zeger, 1986). These models incorporated the study conditions as well as covariates and outcomes. We adjusted models for the corresponding baseline measure and covariates to obtain AORs and adjusted mean differences. We also computed the 95% confidence interval (CI) and the corresponding P value. For each model, we calculated adjusted means and standard errors. We calculated percentage relative change for continuous variables as the difference between the adjusted means for each condition divided by the adjusted mean for the comparison condition.

#### 4.4 Results

Of the 290 randomized participants, 145 were allocated to the A-SEMI intervention and the other 145 to the HPC intervention. Data on 12 study participants were incomplete and therefore not included in data analysis. As a result, results are based on the remaining 278 study participants of which 140 assigned to the A-SEMI intervention and 138 to the HPC intervention.

Table 1 contains a description of the 278 participants in the sample by intervention group. Study participants were 54.3% male. Mean age at baseline was 37.2 years (SD=5.88). Mexico represented the largest group (43.2%) by country of origin followed by Guatemala (20.1%), Honduras (10.1%) and others (26.6%). Slightly more than one quarter of participants (27.7%) did not have any formal education and more than two thirds (68.7%) of study participants had not graduated from high school. A large majority (88.1%) of study participants did not have health insurance and slightly more than three-quarters (75.5%) did not have a primary physician. Almost two-thirds (61.9%) of study participants reported not having received needed medical care in the last 12 months. During the last year prior to baseline assessment, study participants reported having an average of 3.15 sexual partners (SD=1.8). Almost half (48.6%) of the sample reported having only one sexual partner. However, in the past 90 days, most participants (77.6%) reported having only one sexual partner which was often (61.1%) described as a main sexual partner. No significant differences were observed across gender.

In both interventions, 94% of the curricula activities were conducted according to protocol. Participants' attendance was high: 88.3% (n=128) of participants completed all four A-SEMI sessions, and 86.2% (n=125) of participants completed all four HPC sessions. On a 7-

point scale, study participants in both interventions reported comparable high satisfaction ratings (A-SEMI mean=6.3, SD=0.22 vs. HPC mean=6.14. SD=.37). We found no significant differences in attrition across the two interventions (A-SEMI 3-month assessment=91.1%, 9-month assessment=88.3% vs. HPC 3-month assessment=88.7%. 9-month assessment=86.2%). We strongly believe that our partnership with the FWAF and the fact that all study related activities were conducted at their Homestead office contributed to the study's high retention rates.

Effects of the intervention on the primary outcome, consistent condom use, and other dichotomous outcomes are presented in Table 2. These analyses were performed separately at the 3-month assessment (baseline to 3-month assessment), at the 9-month assessment (3- to 9-month assessment) and over the entire 9-month assessment (baseline to 9-month assessment). Over the entire 9-month follow-up period, A-SEMI participants were 4.6 times as likely as HPC participants to report using condoms consistently during the past 90 days ( $P<.001$ ) and 3 times as likely to report using condoms consistently during the past 30 days ( $P<.001$ ). Similarly, over the entire 9-month follow-up period, A-SEMI participants were 55% less likely compared to HPC participants to report never having used condoms during the past 90 days (AOR=0.45; 95% CI=0.27, 0.80) and 49% less likely to report never having used condoms during the last 30 days (AOR=0.51; 95% CI=0.28, 0.93). Finally, A-SEMI participants were 2.6 times more likely to report using condoms at last sexual encounter ( $P<.001$ ) compared to HPC participants.

The effects of the hypothesized psychosocial factors for HIV risk reduction behaviors are presented in Table 3. We observed that psychosocial factors for HIV risk reduction behaviors experienced a positive change over the entire 9-month follow-up period. A-SEMI participants

reported fewer traditional views of gender roles ( $P=.006$ ) than did HPC participants. They also featured higher HIV knowledge ( $P=.009$ ) and reported fewer perceived barriers to condom use ( $P<.001$ ) and greater condom use self-efficacy ( $P<.001$ ).

#### **4.5 Discussion**

Most of the few HIV prevention interventions that target LMWs were initially developed for nonmigrant populations and eventually adapted to target this community (Painter et al., 2012). The existing literature identifies only three interventions that were specifically developed to address HIV prevention among LMWs and demonstrated some degree of efficacy (Painter et al., 2012). Project Salud makes a significant contribution to this limited body of literature by developing—in close collaboration with the LMW community—a culturally tailored HIV prevention intervention (A-SEMI) that addressed the specific needs of the community. Over the entire 9-month period, promising A-SEMI intervention effects were observed for consistent condom use over the last 90 and 30 days prior to assessment. Similarly, positive intervention effects were observed for never having used condoms over the last 90 and 30 days prior to assessment, and using a condom at their last sexual encounter. We also observed favorable changes in hypothesized psychosocial factors for HIV risk reduction over the 9-month follow-up period.

The success of the A-SEMI intervention may be attributable to several factors. A review of various studies (Herbst et al., 2007) underlined the importance of using trained community members as health educators to implement HIV sexual risk reduction interventions. Our results

reinforce this finding by describing how community members were trained as community health workers and played a key role in administering the interventions. These CHWs delivered the intervention curriculum with outstanding fidelity and received very positive ratings from study participants. The observed improvements may also be partly attributable to the adaptation of the intervention to highlight the underlying cultural background, living conditions, and lifestyle of the LMW community. This community background was integrated in the different phases of the study from recruitment and retention of study participants to the administration of questionnaires and interventions. Moreover, community members and partners were deeply involved and played a key role at every stage of the study. Without their collaboration, this study would have not been possible.

This study is not without limitations. First, the study did not test participants for HIV and other STIs. Prevalence and incidence information among LMWs is very sparse and this study could have made a significant contribution in that regard. However, community members and partners considered that making HIV testing an eligibility criterion would have compromised participation and interfered with the process of gaining trust in the community. A second methodological concern is the fact behavioral risk data in this study are self-reported and subject to recall bias. We attempted to minimize this concern through the use of calendaring techniques that are designed to maximize recall (McElrath et al., 1994). Moreover, prior research has established the validity and reliability of self-reported risk behaviors (Ochs & Binik, 1999; Miller et al., 1990; Jaccard & Wan, 1995). Third, this study does not claim to be representative of all LMWs in South Florida because it is not possible to enumerate this population and sample it in a random manner. We attempted to increase the representativeness

of the sample by selecting study participants from different neighborhoods and camps within the Homestead/Florida City area.

#### **4.6 Conclusions**

Project Salud demonstrated the feasibility of developing and delivering a brief HIV prevention intervention to LMWs, traditionally considered a hard to access population at high risk for HIV infection. This study has laid the groundwork for a more comprehensive study that will test the efficacy of Project Salud to promote long-term behavioral changes among this population. Project Salud will also benefit from adopting a socioenvironmental framework in which HIV related risk behaviors are embedded within the dynamic interplay of key social, environmental and individual factors. Finally, Project Salud will conduct HIV and other STIs testing as to assess objective biological outcomes that estimate incident infection rates as well as intervention efficacy.

## TABLES

TABLE 1. Characteristics of Study Participants by Intervention

Characteristics	A-SEMI (n = 140) %	HPC (n = 138) %	Total (n = 278) %
<b>Gender</b>			
Male	52.1	56.3	54.3
Female	47.9	43.7	45.7
Age, mean (SD)	36.6 (4.41)	39.4 (3.91)	37.2 (5.88)
<b>Country of Origin</b>			
Mexico	44.2	42.0	43.2
Guatemala	18.6	21.8	20.1
Honduras	10.7	9.4	10.1
Others	26.5	26.8	26.6
<b>Education</b>			
No formal education	28.6	26.8	27.7
< High School degree	66.4	71.0	68.7
> High School degree	5.0	2.2	3.6
<b>Health Insurance</b>			
No	85.7	90.6	88.1
Yes	14.3	9.4	11.9
<b>Primary Physician*</b>			
No	64.3	87.0	75.5
Yes	35.7	13.0	24.5
<b>Received Medical Care when needed in last 12 months</b>			
No	55.6	65.2	61.9
Yes	44.4	34.8	38.1
<b>Number of Sexual Partners in 90 days prior to Baseline</b>			
1	74.3	81.2	77.6
2 or more	25.7	18.8	22.4

\*  $p < .001$ .

Table 2. Effects of A-SEMI and HPC Interventions for Latino Migrant Workers on Condom Use Behaviors

Behavior	Baseline Assessment <sup>a</sup>		3-Month Assessment <sup>a</sup>			<i>p</i>
	A-SEMI %	HPC %	A-SEMI %	HP %	AQR <sup>b</sup> (95% CI)	
Consistent Condom Use						
Past 90 days	5.2	5.6	45.3	17.4	5.28 [2.33, 13.58]	< .001
Past 30 days	10.4	9.8	51.6	23.8	3.03 (1.65, 7.14)	0.004
Never Used Condoms						
Past 90 days	63.1	66	23.5	41.2	0.29 [0.13, 0.74]	0.006
Past 30 days	70.5	73.1	30.7	49.1	0.58 [0.24, 0.82]	0.005
Condom Use at Last Sexual Encounter	14.8	17.2	59.3	31.6	3.49 [1.77, 6.86]	< .001

Behavior	9-Month Assessment <sup>a</sup>			GEE Model Baseline to 9-Month Assessment	
	A-SEMI %	HPC %	AOR (95% CI)	AOR (95% CI)	<i>p</i>
Past 90 days	38.2	15.4	4.66 (2.18, 9.96)	4.62 (2.37, 9.67)	< .001
Past 30 days	44.5	24.5	3.33 [1.58, 7.12]	3.03 [1.65, 5.52]	< .001
Never Used Condoms					
Past 90 days	32.1	45.7	0.51 [0.23, 0.99]	0.45 [0.27, 0.80]	0.008
Past 30 days	36.6	48.4	0.46 [0.26, 1.02]	0.51 (0.28, 0.93)	0.02
Condom Use at Last Sexual Encounter	50.4	34.6	2.03 [1.10, 3.51]	2.61 [1.58, 4.59]	< .001

Note. <sup>a</sup>unadjusted proportions. <sup>b</sup>Adjusted for baseline value of the outcome variable and having a primary physician; HPC (comparison intervention was the referent for computing the AOR).

TABLE 3. Effects of A-SEMI and HPC Interventions for Latino Migrant Workers on Psychosocial Mediators of Preventive Behavior, Baseline to 9-Month Assessment

Mediator	Baseline Assessment		GEE Model Baseline to 9-Month Assessment	
	A-SEMI	HPC	Relative Change' % (95% CI)	<i>p</i>
	Unadjusted Mean (SD)	Unadjusted Mean (SD)		
Traditional View of Gender Roles (range = 10-40)	21.42 (4.53)	20.12 (3.86)	5.14 (3.40, 6.43)	0.006
HIV Prevention Knowledge (Range = 1-8)	6.19(1.11)	6.34 (1.08)	2.82 (1.65, 4.06)	0.009
Perceived Barriers to Condom Use (Range= 29-116)	67.15 (14.86)	65.16 (13.39)	13.03 (8.65, 9.12)	<.001
Condom Use Self-Efficacy (Range = 9-27)	20.57 (4.02)	19.88 (5.13)	9.78 (7.14, 11.66)	<.001

Note. \*Relative Change = (Mean difference between A-SEMI and HPC/mean for IIPC x 100%) and 95% CI around the relative change.

## REFERENCES

- Aranda-Naranjo B & Gaskins S. HIV/AIDS in migrant and seasonal farm workers. *J Assoc Nurses AIDS Care*. 1998;9(5):80-3.
- Asbury J. Overview of focus group research. *Qual Health Res* 1995;5:414-20.
- Baldwin J. Using peer education approaches in HIV/AIDS programs for youth: A review of the literature. *Peer Facilitator Q*. 1995;12:34-37.
- Bandura, A. Social cognitive theory and exercise of control over HIV infection. In: 5. DiClemente RJ, Peterson J, (Eds). *Preventing AIDS: Theories and Methods of Behavioral Interventions*. New York, NY: Plenum Publishing;1994:25-59.
- Borkovec, T.D. (1990). Control groups and comparison groups in psychotherapy outcome research. *NIDA Research Monograph*, 104, 50-65.
- Borkovec, T.D., Echemendia, R.J., Ragusea, S.A. & Rui, M. (2001). The Pennsylvania practice research network and future possibilities for clinically meaningful and scientifically rigorous psychotherapy effectiveness research. *Clinical Psychology Science and Practice*, 8, 155-167.
- Carroll, K.M., Nich, C., & Rounsaville, B.J. (1998). Use of observer and therapist ratings to monitor delivery of coping skills treatment for cocaine abusers: utility of therapist session checklists. *Psychotherapy Research*, 8, 307-320.
- Center for Disease Control and Prevention. HIV Behavioral Interventions for Hispanics/Latinos in the US: A Meta-Analytic Review [internet]. 2008. Available at:

[http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst\\_latinoconsult.pdf](http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst_latinoconsult.pdf). Retrieved January 15, 2013.

Center for Disease Control and Prevention. Oral sex and HIV risk [internet]. 2009. Available at: <http://www.cdc.gov/hiv/resources/factsheets/PDF/oralsex.pdf>. Retrieved on January 17, 2013.

De Vicenzi I. A longitudinal study of human immunodeficiency virus transmission by heterosexual partners. *N England J Med*. 1994;331:341-346.

Fernandez MI, Collazo JB, Hernandez N, et al. Predictors of HIV risk among Hispanic farm workers in South Florida: women are at higher risk than men. *AIDS Behav*. 2004;8(2):165-74.

Fisher, J., & Fisher, W. (1992). Changing AIDS risk behavior. *Psychological Bulletin*, 111, 455-474.

Hardin JW & Hilbe JM. *Generalized Estimating Equations*. New York, NY: Chapman & Hall/CRC. 2003.

Haour-Knipe, M., Fleury, F., & Dubois-Arber, F. (1999). HIV/AIDS prevention for migrants and ethnic minorities: Three phases of evaluation. *Social Science and Medicine*, 49(10), 1357-1372.

Herbst JH, Kay LS, Passin WF et al. A systematic review and meta-analysis of behavioral interventions to reduce HIV risk behaviors of Hispanics in the United States and Puerto Rico. *AIDS Behav*. 2007; 11(1):25-47.

Hernandez MT, Lemp GF, Castañeda X, et al. HIV/AIDS among Mexican migrants and recent immigrants in California and Mexico. *J Acquir Immune Defic Syndr*. 2004; 37(4):s203.

Hosmer DW & Lemeshow SL. *Applied Logistic Regression*. New York, NY: John Wiley & Sons. 1989.

Jaccard J & Wan CK. A paradigm for studying the accuracy of self-reports of risk behavior relevant to AIDS: empirical perspectives on stability, recall bias, and transitory influences. *J Appl Soc Psychol*. 1995; 25:1831-1858.

Kalichman, S.C. (1998). *Preventing AIDS: A sourcebook for Behavioral Interventions*. Mahwah, New Jersey: Lawrence Erlbaum Publishers.

Kalichman, S.C., Cherry, C., & Browne-Sperling, F. (1999). Effectiveness of a video-based motivational skills-building HIV risk-reduction intervention for inner-city African American men. *Journal of Consulting and Clinical Psychology*, 67, 959-966.

Kalichman, S., Somlai, A., & Sikkema, K. (2001). Community Involvement in HIV-AIDS Prevention. N. Schneiderman, J. Gentry, J.M. da Silva, M. Speers, & H. Tomes. *Integrating Behavioral and Social Sciences with Public Health*. Washington, DC: American Psychological Association. *Behavioral and Social Sciences with Public Health*. Washington, DC: American Psychological Association. 2001: 85-102.

Kleinbaum DG, Kupper LL, Muller KE et al. *Applied Regression Analysis and Other Multivariable Methods*. New York, NY: Duxbury Press. 1998.

Latkin, CA. Outreach in natural settings: the use of peer leaders for HIV prevention among injecting drug users' networks. *Public Health Reports*. 1998;113(Suppl. 1):151-159.

Liang KY & Zeger SL. Longitudinal data analysis using generalized linear models. *Biometrika*. 1986;73(1):13-22.

Marin BV, Gomez CA, Tschann JM, Gregorich SE. Condom use in unmarried Latino men: a test of cultural constructs. *Health Psychol*. 1997;16(5):458---467.

Marin BV, Gomez CA, Tschann JM, Gregorich SE. Self-efficacy to use condoms in unmarried Latino adults. *Am J Community Psychol*. 1998;26(1):53---71.

McCoy HV, McCoy CB, Lai S. Effectiveness of HIV interventions among women drug users. *Women Health*. 1998;27(1-2):49-69.

McCoy HV, McCoy CB, Lai S, et al. Behavior changes among crack-using rural and urban women. *Subst Use Misuse*. 1999;34(4-5):667-84.

McElrath K, Chitwood DD, Griffin DK & Comerford M. Consistency of self-reported HIV risk behavior among injecting drug users. *Am. J. Public Health*. 1994; 84:1965-1970.

Miller WR & Rollnick S. *Motivational Interviewing: Preparing People for Change*. New York, NY: Guilford Press. 2002.

Miller HG, Turner CF & Moses LE. *AIDS: The second decade*. Washington DC: Academy Press; 1990: 359-472.

Mishra SI, Conner RF. Evaluation of an HIV prevention program among Latino farmworkers. In Mishra SI, Conner RF, Magaña JR, eds. AIDS crossing borders: The spread among migrant Latino. Colorado: Westview Press;1996.

Morgan DL. The Focus Group Guidebook. Thousand Oaks, CA: Sage, 1993.

Morisky DE., Ang A. Coly A & Tiglao TV. A model HIV/AIDS risk reduction program in the Phillipines: a comprehensive community-based approach through participatory action research. Health Promotion International. 2004;19(1):69-76.

Morisky DE., Ebin VJ. The effectiveness of peer education STD/HIV prevention. In: Alex S, Kar S & Alcalay R (Eds.). Health Communication: A Multicultural Perspective. Thousand Oaks, CA: Sage Publications, Inc. 2004:211-234.

Neaigus, A., Friedman, S.R., Curtis, R., Des Jarlais, D.C., Furst, R.T., Jose, B., Mota, P., Stepherson, B., Sufian, M., Ward, T., et al. (1994). The relevance of drug injectors' social and risk networks for understanding and preventing HIV infection. Social Science Medicine, 38(1), 67-78.

Ochs EP & Binik YM. The use of couple data to determine the reliability of self-reported sexual behavior. J Sex Res. 1999; 36:374-384.

Organista PB, Organista KC & Soloff PR. Exploring AIDS-related knowledge, attitudes, and behaviors of female Mexican migrant workers. Health Soc Work. 1998;23(2),96-103.

Painter TM, Organista KC, Rhodes SD & Sañudo FM. Interventions to prevent HIV and other sexually transmitted diseases among Latino migrants. In: Organista KC (ed.) HIV Prevention

with Latinos. *Theory, Research, and Practice*. New York, NY: Oxford University Press. 2012:351-381.

Pearlman DN, Camberg L, Wallace LJ, Symons P & Finison L. Tapping youth as agents for change: evaluation of a peer leadership HIV/AIDS intervention. *Journal of Adolescent Health* 2002; 31(1):31-39.

Perry, C.L., & Sieving, R. Peer Involvement in Global AIDS Prevention among Adolescents. Unpublished review commissioned by the Global Programme on AIDS. WHO, 1991.

Piantadosi S. *Clinical Trials: A Methodologic Perspective*. New York, NY: John Wiley & Sons. 1997.

Pocock SJ. *Clinical Trials*. New York, NY: John Wiley & Sons. 1993.

Prochaska, J.O., DiClemente, C.C., & Norcross, J.C. (1992). In search of how people change: applications to addictive behaviors. *American Psychologist*, 47, 1102-1104.

Sanchez J, Serna CA, De La Rosa M. Project Salud: Using community-based participatory research to culturally adapt an HIV prevention intervention in the Latino migrant worker community. *Int Public Health J*. 2012;4(3):301-308.

Sanchez J, Silva-Suarez G, Serna CA & De La Rosa M. The Latino migrant worker HIV prevention program. *Fam Community Health*. 2012;35(2):139-146.

Sanchez MA, Lemp GF, Rodriguez-Magis C, Bravo-Garcia W, Carter S & Ruiz JD. The epidemiology of HIV among Mexican Migrants and recent immigrants in California and Mexico. *J Acquir Immune Defic Syndr*. 2004;37(4):s204-14.

Saracco A, Musicco M, Nicolosi A, et al. Man-to-woman sexual transmission of HIV: longitudinal study of 343 steady partners of infected men. *J Acquir Immune Defic Syndr*. 1993;6:497-502.

Shtarkshall, R., & Soskolne, V. Migrant populations and HIV/AIDS: The development and implementation of programmes: theory, methodology and practice. UNESCO UNAIDS. 2000.

Sikkema KJ, Kelly JA, Winett RA, et al. Outcomes of a randomized community-level HIV prevention intervention for women living in 18 low-income housing developments. *Am J Public Health*. 2000;90(1):57---63.

Soskolne V, Shtarkshall RA. Migration and HIV prevention programmes: Linking structural factors, culture, and individual behaviour--an Israeli experience. *Soc Sci Med*. 2002;55(8),1297-1307.

St Lawrence JS, Chapdelaine AP, Devieux JG, O'Bannon RE 3rd, Brasfield TL, Eldridge GD. Measuring perceived barriers to condom use: psychometric evaluation of the condom barriers scale. *Assessment*. 1999;6(4):391---404.

U.S. Census Bureau. United States Census Bureau: State and County Quick Facts [internet]. 2012. Available at: <http://quickfacts.census.gov/qfd/states/00000.html>. Retrieved on January 15, 2013.

Watters J & Biernacki P. Targeted sampling: Options for the study of hidden populations. *Social Problems*. 1989;36:416-430.

Weatherby NL, McCoy HV, Bletzer KV, et al. Sexual activity and HIV among drug users: Migrant workers and their sexual partners in southern Florida. *Florida Journal of Public Health*. 1995;7(1):22-26.

Weatherby NL, McCoy HV, Bletzer KV, et al. Immigration and HIV among migrant workers in rural southern Florida. *J Drug Issues*. 1997;27(1):155-72.

Wingood GM, DiClemente RJ. Partner influences and gender-related factors associated with noncondom use among young adult African-American women. *Am J Community Psychol*. 1998;26(1):29---51.

Wren, P.A., Janz, N.K., Carovano, K., Zimmerman, M.A., & Washienko, K.M. (1997). Preventing the spread of AIDS in youth: Principles of practice from 11 diverse projects. *Journal of Adolescent Health*, 21, 309-317.

# APÉNDICE 1

## ARTÍCULOS CIENTÍFICOS DERIVADOS DE LA TESIS

### A. Listado de artículos y su impacto científico

1. Sánchez, Jesus (2013). "Engaging the Latino Migrant Worker Community in the Cultural Adaptation and Implementation of an HIV Prevention Intervention in South Florida". *International Public Health Journal Monograph*: 1-11. Monograph Series: Social Issues, Justice and Status.

Factor Impacto Revista : 1.993

2. Sanchez, Jesus., Georgina Silva-Suarez, Claudia A. Serna, Claudia A., Mario De La Rosa (2012). "The Latino migrant worker HIV prevention program: building a community partnership through a community health worker training program". *Family & community health*, 35 (2): 139-146.

Factor Impacto Revista: 0.907

3. Sánchez, Jesús, Claudia A. Serna, and Mario de La Rosa (2012). "Project Salud: Using community-based participatory research to culturally adapt an HIV prevention intervention in the Latino migrant worker community." *International public health journal* 4 (3): 301-308.

Factor Impacto Revista: 1.993

4. Sánchez, Jesús, Mario De La Rosa, and Claudia A. Serna (2013). "Project Salud: Efficacy of a Community-Based HIV Prevention Intervention for Hispanic Migrant Workers in South Florida." *AIDS Education and Prevention* 25 (5): 363-375.

Factor Impacto Revista: 1.484

**B. Declaración de los coautores del papel central del primer autor, y de su compromiso a no utilizar estos artículos como parte de ningún proyecto propio.**

May 23, 2014

The undersigned hereby state that the content of this dissertation is the sole work of its author, Dr. Jesús Sánchez Jiménez. Dr. Sánchez was the Principal Investigator on the study that generated these data and, as such, he was involved in all study related activities. Dr. Sánchez is responsible for writing this dissertation. This dissertation and the papers and materials that support it will not be utilized by the undersigned towards the preparation and defense of any other doctoral dissertation.



Claudia A. Serna



Georgina Silva-Suarez



Mario De la Rosa

**ARTÍCULOS CIENTÍFICOS  
DERIVADOS DE LA TESIS**

# **ENGAGING THE LATINO MIGRANT WORKER COMMUNITY IN THE CULTURAL ADAPTATION AND IMPLEMENTATION OF AN HIV PREVENTION INTERVENTION IN SOUTH FLORIDA**

*Jesús Sánchez*<sup>1\*</sup>

<sup>1</sup>Department of Sociobehavioral and Administrative Pharmacy,  
College of Pharmacy, Nova Southeastern University, Fort Lauderdale, Florida

## **ABSTRACT**

Despite the unique and challenging circumstances confronting Latino migrant worker communities in the United States, debate still exists as to the need to culturally adapt evidence-based interventions for dissemination with this population. Project Salud adopted a community-based participatory research model and utilized focus group methodology with 83 Latino migrant workers to explore the relevance of culturally adapting an evidence-based HIV prevention intervention to be disseminated within this population. Findings from this study indicate that, despite early reservations, Latino migrant workers wanted to participate in the cultural adaptation that would result in an intervention that was culturally relevant, respectful, responsive to their life experiences, and aligned with their needs. Our findings also indicate that, relative to the comparison condition, A-SEMI participants reported more consistent condom use, were less likely to report never having used condoms, and more likely to use condoms at last sexual encounter during the past 90 and 30 days. A-SEMI participants also experienced a positive change in regard to factors for HIV-preventative behaviors over the entire 9-month period. Our results support the implementation of community-based, culturally tailored interventions among Latino migrant workers. The study results also contribute to the cultural adaptation/fidelity debate by highlighting the necessity of exploring ways to develop culturally adapted interventions characterized by high cultural relevance without sacrificing high fidelity to the core components that have established efficacy for evidence-based HIV prevention interventions.

## **INTRODUCTION**

Understanding and addressing the causes of HIV related health disparities among Latinos in the U.S. is increasingly relevant as the magnitude of immigrant and migrant populations from Latin America and the Caribbean continue to grow [1]. The Latino

\* Correspondence: Professor Jesús Sánchez, Ph.D. Associate Professor, Department of Sociobehavioral and Administrative Pharmacy, College of Pharmacy, Nova Southeastern University, 3200 South University Drive, Fort Lauderdale, FL 33328-2018. E-mail: js2769@nova.edu

community living in the United States has been disproportionately impacted by the HIV/AIDS epidemic [2], while the development, implementation, and evaluation of HIV prevention interventions designed to reduce the risk of infection among Latinos lags behind prevention efforts targeting other communities [3]. This public health gap is particularly apparent when considering the sparse attention received by Latino migrant workers in the United States despite their high risk for HIV infection. Research indicates that most Latino migrant workers (LMWs) become infected while in the U.S., underlining the importance of enhancing both HIV prevention and treatment efforts [4].

Research has specifically linked migration to increased HIV incidence and vulnerability in a variety of contexts and places. A greater risk for poor health and limited access to health services, low socioeconomic status, low levels of formal education, and marginalization are among the main reasons why LMWs are particularly vulnerable to HIV infection [5-6]. The few available studies on HIV transmission and prevention specifically conducted among Latino migrant workers highlight the role played by many complex and interrelated factors. These include social norms, health-related beliefs, attitudes and behaviors related to sex and drug use, and social and environmental factors such as housing and employment [7-11]. LMWs bring with them an assortment of beliefs, attitudes, and practices that vary from country to country of origin and that—when put into practice in their new communities—often result in a sense of cultural shock, stress, and alienation that may impact health-risk behaviors, in general, and HIV related risk behaviors in particular. The development of effective HIV prevention interventions for the Latino migrant worker community requires that we address the cultural and societal issues that put LMWs at risk as well as focus on the cultural strengths that might assist members of this community to stay safe.

While the existing studies have made a critical contribution to advance our understanding of the Latino migrant worker population in the US and highlight numerous potential differences between this and other populations, their HIV prevention interventions have demonstrated only limited effectiveness [12-14] and documented a critical need for tailoring effective HIV prevention interventions for the Latino migrant worker population. These adaptations, however, cannot be limited to the cultural translation of existing interventions based on cultural generalizations or preconceptions associated with Latinos [15-16]. A pervasive limitation of many of these cultural translations involves the use of the umbrella category “Latino” (or “Hispanic”) which presents an obfuscated description that pretends to capture the characteristics of a large group of national and ethnic populations. Another important limitation is the imposition of the term “Latino” on different subgroups with different characteristics, backgrounds, and migration experiences without asking members of these groups for their opinion. These limitations contribute to the traditional mistrust among LMWs of conventional research which they view as paternalistic, misguided, and irrelevant to their needs. As a result, conventional prevention strategies are likely to fail to adequately help Latino migrant workers to adopt and maintain HIV risk reduction behaviors in a constantly shifting personal and social environment [17-19]. Culturally adapted interventions must prompt community engagement and participation at every phase of the program if they do not want to remain culturally blind. Latino migrant workers are most likely to benefit from HIV prevention efforts when these efforts are supported at the community level, sustained over time, and the overall needs of the community are addressed [20-22].

Prevention research emerged in the early 1970’s as a powerful instrument for addressing health problems. As intervention strategies to prevent a vast array of health issues developed, research methodologies for evaluating the effectiveness of these

interventions emerged as well. A significant volume of the formative work in the area of prevention research has been shaped by investigators working within the confines of academic institutions. As a result, such work has been vastly predisposed by a positivistic research tradition that emphasizes the independent and objective perspective of the scientist. While this positivistic approach to prevention presents multiple advantages, including high levels of fidelity in the implementation of interventions and the utilization of sophisticated evaluation designs, several weaknesses have materialized over time that attest to the limitations of conventional prevention research strategies [23]. Because of its underlying assumptions, conventional prevention research has traditionally ignored cultural diversity and disenfranchised those communities it intended to serve.

Community based participatory research (CBPR) has emerged as a research paradigm that addresses the limitations of conventional research models and offers a "collaborative approach to research that equitably involves all partners in the research process and recognizes the unique strengths that each brings. The ultimate goal is to promote social change to improve community health and reduce health disparities" [23]. Advantages of CBPR include that it is a participatory and cooperative approach, requires equitable power and mutual ownership, is framed in a co-learning experience, and seeks the balance between research and action. Furthermore, it is an empowering process that involves capacity building among all partners involved.

In this chapter, we describe (a) Project Salud, a growing CBPR partnership between the Latino migrant worker community in South Florida and researchers at Nova Southeastern University and Florida International University; and (b) the value of using focus groups with the Latino migrant community in South Florida to culturally adapt an evidence-based HIV prevention intervention before implementation in the community.

## OUR PROJECT

Project Salud--officially entitled "HIV Risk Reduction among High Risk Latino Migrant Workers in South Florida"--was a 4-year major study funded by the National Institute on Minority Health and Health Disparities (NIMHD) as part of C-Salud, a P20 Exploratory Center of Excellence at Florida International University. The main objective of Project Salud was to assess the differential effectiveness of an Adapted Stage-Enhanced Motivational Interviewing (A-SEMI) compared to a Health Promotion Comparison (HPC) condition for producing long-term reductions in HIV risk and increased health behaviors among LMWs. The design of the A-SEMI intervention is considered to be an enhancement over existing cognitive behavioral risk reduction approaches because A-SEMI integrates key contextual components from effective HIV prevention interventions (i.e., peer counseling) linked to maintenance of risk reduction effects. As described in this paper, the A-SEMI intervention was culturally adapted in collaboration with the LMW community.

Project Salud was conceived as a CBPR project with the goal of engaging the Latino migrant worker community in Homestead in the implementation of an HIV prevention intervention. By framing Project Salud within the CBPR approach, this study responded to the NIH priority on establishing equitable partnerships between community members and researchers with the final goal of increasing community participation in the research process, improving community health, and reducing HIV-related health disparities.

## Design

At the early stages of Project Salud, we set off a plan to address the issue of cultural adaptation while reinforcing trust in the community and creating community capacity as a key building block in the development of our partnership with the Latino migrant worker community. We initiated a dialogue with key community partners and community members with the goal of identifying what type of strategies would be adequate to address the issue of HIV prevention among Latino migrant workers. The ultimate goal of this dialogue was to juxtapose the views of both the community and the researchers. Based on this exchange of ideas and using other researchers' experiences as a learning framework [24-26], we decided that focus group methodology was the appropriate approach. Researchers who work with migrant populations have reported on the complexities of working with these populations and how a unique sensitivity is required to understand how particular phenomena are experienced and expressed [27]. Focus groups provide several advantages over the conventional methods in instrument development. First, focus groups are useful for developing insights into the perceptions and points of view of persons who have some common characteristics related to the research topic and for appreciating the variation in people's experiences [28]. The resulting intervention is more likely to be grounded in the experiences of the population under study. Generating knowledge from focus groups can provide reasonable assurance that the instrument is culturally anchored. Second, focus groups inform researchers about the language and terminology that particular groups of people use regarding the construct under study [28]. By preserving the terminology from the focus group, items included in the intervention may reflect the language of the population of interest. Third, the focus group's social nature often stimulates stories and insights that would be missed otherwise [29].

Focus groups were conducted at the early stages of Project Salud when both the project and the researchers involved in it were still unknown to many community members. We undertook a series of preparatory activities prior to conducting the focus groups to better inform the Latino migrant worker community in Homestead about who we were, the goals of the project, and our desire to establish a true partnership with the community. As part of these preparatory steps, we conducted several town hall meetings at venues such as churches, street markets, a community center, and the offices of the Farmworker Association of Florida in Homestead. We expanded our partnership with professionals in health and social services, advocates, religious leaders, AIDS educators and, more importantly, nursery and agricultural workers. As our partnership grew larger and stronger, Project Salud started being recognized in the community.

Another positive outcome of our increasing presence and recognition in the community resulted in the implementation of strategies that increased recruitment rates and representativeness. Community members' concerns about becoming involved in a focus group began to dissipate during town hall meetings and the different activities conducted at the early stages of the project. The support of community partners was crucial at a time when the current anti-immigration climate and policies in the U.S. have negatively impacted the lives of migrant workers. We addressed this issue by validating such concerns and extensively reviewing the standards of confidentiality and the rights of each participant (i.e., right to withdraw from the study at any time, right to refuse to answer questions). We also adopted community members' suggestions regarding the locations where we could meet and conduct the focus groups. The suggested sites--unlike

some of the locations we had originally preselected--were considered by the community as safer and less likely to be raided by immigration authorities.

To be selected for the focus groups, participants had to (a) be 18 years old or older; (b) be a first generation immigrant; (c) be a member of the Latino migrant worker community in the Homestead area; and (d) express an interest to participate in the focus group interview.

A total of eight focus groups were conducted with a range of 6 to 12 participants per focus group. A maximum number of 12 participants per group was established in order to better facilitate group discussions. Each focus group interview lasted between 120 and 180 minutes and was held in the evening and/or weekend. All focus groups started with a dinner, an overview of Project Salud, completion of a consent form, and brief demographic questionnaire. Each participant received a \$40 stipend for their participation. Participants were required by IRB policy to complete a form documenting their receipt of the participant payment; however, no personal identifiers were requested.

Eighty-three members of the Latino migrant worker community participated in the focus groups. Although it was planned in the original research protocol to organize focus groups according to a set of criteria (i.e., gender, nationality, age), the design was modified in response to the contextual challenges associated with recruitment. In particular, participants were encouraged to join whichever focus group was possible for them to attend.

Focus groups were consistent in their delivery and draw upon the same protocol guidelines. Each session was facilitated by a project member with experience in focus group facilitation while another project member was present at each session as a note-taker. Focus groups were conducted in Spanish and the discussions were audio recorded and then transcribed for purposes of data analysis. Prior to conducting the focus groups, we hired two members from the LMW community to be trained on the project, assist with the development of the focus group protocol, and support focus group sessions.

Project Salud members introduced themselves and provided a five to ten minute overview of the project. Project members made this presentation highly interactive as a means to warm up the focus group participants. For instance, they included a trivia or guessing game as part of the presentation. Group members introduced themselves and were invited to briefly express an opinion on the impact of the HIV/AIDS epidemic on their community. This initial discussion provided a context for the group from which to proceed. Participants were told that focus groups were being held in order to learn from the Latino migrant worker community about their knowledge, behaviors, and attitudes towards the HIV/AIDS epidemic. They were also inquired about their interest in participating in a study that would utilize the information learned from the focus groups to determine how the different intervention components should be adapted and implemented in order to increase community members' motivation to participate in this initiative and establish a sustainable strategy for implementing the adapted intervention in the community.

Project Salud members explained that the research team sought to offer an existing evidence-based HIV prevention intervention to the LMW community that had proven beneficial to other communities. Therefore, the focus group sessions were a key step toward clarifying how relevant LMWs find the specific core components (i.e., skills) covered in the original intervention, exploring if the intervention was responsive to their life experiences and cultural background, and making the necessary cultural adaptations. The ensuing discussion followed the protocol guidelines tailored to explore and discuss the core components of the evidence-based intervention.

## OUR FINDINGS

Using focus groups proved to be a challenging but successful experience that provided many insights into culturally shaping the A-SEMI intervention. In this section, a few examples are offered on the type of knowledge that was gathered through the implementation of the focus groups as well as how that information was utilized towards the cultural adaptation of the intervention.

Talking about HIV-related behaviors, attitudes, and beliefs in a group setting can be extremely difficult for Latino men and women who view topics such as sexual behaviors as very personal. Because of this, we found that some participants would talk about these issues as if they were happening to a friend or relative. On the other hand, we also concluded that—although less private—the use of oral and group-centered strategies were more reflective of the dominant learning styles, orientations, values and educational levels of participants. As a result, although an interventionist would typically encourage participants to talk about their own experiences and opinions, we agreed that when working with the LMW community, we needed to be aware that—in some instances—one strategy to cope with the discomfort of talking about personal issues is to frame it as the experience of someone else.

The focus groups also revealed the need for a more dynamic understanding of the cultural milieu that characterizes Latino migrant worker communities. An example of how sweeping assertions about Latino culture fail to capture the shifting cultural dynamics of this community is reflected in the impact of changing gender roles on sexual relations. Traditional gender roles are often associated with Latino culture. Machismo and marianismo are presented as playing a crucial role in shaping sexual communication and relations between Latino men and women (30). Because of the apparent power imbalance that characterizes these relationships, some scholars suggest that theories that emphasize sexual division of labor and power may be an appropriate intervention framework. However, our focus groups revealed that—although often times this power imbalance may have characterized participants' sexual relations in their countries of origin—as LMWs spend more time away from their countries of origin, they begin to reconsider those gender role expectations. This trend was particularly salient among the women who participated in the focus groups. Having to endure the same harsh working and housing conditions as their male counterparts, Latina migrant workers question the traditional idea of the submissive Latina who centers her life around her family and is generally obedient to the men in her life. As a result, sexual culture in the LMW community can be characterized as the coexistence of traditional and modern values. In light of this finding, it was crucial to culturally adapt the A-SEMI intervention to reflect the coexisting cultural expectations and rules of sexual interaction among LMWs.

Another salient value associated with traditional Latino culture is familismo, which places the multigenerational extended family at the core of the culture. Familismo promotes closeness and interconnectedness among extended family members and provides a sense of responsibility to care for all members of the family [30]. Most of the participants in the focus groups had few or no relatives living with them in the U.S. Many of the male participants indicated that they came to the U.S. by themselves and would not risk bringing their families over because of the risks associated with getting smuggled into the U.S. Other participants indicated that their spouses or significant others had been deported back to their countries of origin and, in most cases, were trying to cross the border again. As a result, the positive impact provided by familismo in terms of social support, knowledge, and material resources is lacking in the LMW community. In its

absence, participants stressed the importance of developing a sense of community. Participants highlighted the importance of facilitating learning experiences by promoting a sense of community among those who would participate in the intervention. Specifically, rather than limiting group interventions to didactic sessions focused exclusively on disseminating knowledge and teaching skills, participants affirmed that interventions should also promote group cohesion and supportive relationships among intervention participants. Many participants in the focus groups commented on how valuable the focus group session was to them, as well as their desire to extend the same type of dynamic into the intervention. Participants expressed that the intervention groups should constitute a resource for empowering participants. Consequently, the A-SEMI intervention was culturally adapted to enhance empowerment as a multilayered process beyond the cultural domains directly related to HIV prevention (i.e., sexual relations).

### **Conducting Project Salud**

A network-based sample of 278 Latino migrant workers was recruited from November 2008 to December 2010 from migrant communities in the Homestead area in Miami-Dade County, Florida. Homestead is part of a predominantly rural area in the South of Miami-Dade County, Florida. Official census data indicate that most of the population in Homestead (51.8%) is Hispanic/Latino, more than one-third (36%) is foreign born, and a majority (57.3%) speaks a language other than English at home [31]. Agriculture and nursery constitute an important business in the Homestead area allowing for access to seasonal farm work. Homestead's Latino migrant worker population is composed primarily of recently arrived, young, single or married men that are in the United States alone. They live in small crowded apartments with family or friends. Most are Mexican and Central American arriving in this area with little or no English language skills and very limited resources.

After screening for eligibility, participants were administered a structured baseline questionnaire using A-CASI that included basic socio-demographic information, alcohol and other drug use history, sexual behaviors, acculturation, and behavioral intentionality. Study participants were then randomly assigned to the A-SEMI and HPC intervention groups. Two follow-up assessments were administered at 3 and 9 months after the baseline questionnaire. This study was approved by the IRB of Florida International University. Study findings indicate that A-SEMI participants were more likely to engage in safe sexual behaviors compared to HPC participants. Over the entire 9-month period, promising A-SEMI intervention effects were observed for consistent condom use over the last 90 and 30 days prior to assessment. Similarly, positive intervention effects were observed for never having used condoms over the last 90 and 30 days prior to assessment, and using a condom at their last sexual encounter. We also observed favorable changes in hypothesized psychosocial factors for HIV risk reduction over the 9-month follow-up period [32].

## **DISCUSSION**

This study contributes to the existing literature in relevant ways. For instance, the narratives shared by members of the Latino migrant worker community provide additional evidence of their resistance to participate in conventional research which they perceive as paternalistic, abusive, and irrelevant to their needs. Overcoming their

traditional mistrust and engaging the LMW community was paramount for the success of Project Salud.

Culturally adapted interventions must prompt community engagement and participation at every phase of the program if they do not want to remain culturally blind. Findings from this study underscore the strong desire of LMWs in the Homestead community to participate in HIV prevention interventions and highlight the importance for interventions to be culturally relevant, respectful, and responsive to their life experiences. In particular, it is important to adapt interventions according to relevant Latino cultural values and experiences specific to the Latino group under consideration instead of just relying on sweeping generalizations about Latino culture. Participants in this study emphasized that interventionists needed to communicate to community members a genuine understanding of the contextual challenges that impact their lives, help them to address barriers to participation, and constantly promote a dialogue aimed at examining the cultural relevance of the intervention. For instance, participants conveyed the importance of promoting a sense of empowerment and community among participants taking part in the intervention and emphasized the important role this could play given that many of the participants were not living with their families. Thus, interventions that rely primarily on dyadic instruction between the interventionist and community member may be of limited appeal to the LMW community. Instead, culturally relevant interventions for LMWs should facilitate a group learning experience that promotes trust, social support, and empowerment.

We also believe that present findings also contribute in a significant way to the cultural adaptation/fidelity debate. While cultural adaptation scholars argue that evidence-based interventions should be culturally adapted before dissemination [33], fidelity advocates consider that the need for cultural adaptation has been overstated [33]. Researchers have also expressed that modifying existing interventions may reduce or eliminate the impact of the core components of original interventions [34]. While Project Salud recognizes the need to respect the core components of the original intervention that proved to be efficacious, we agree with those who underscore the importance of attending to the cultural values and traditions that target populations consider to be most relevant in their lives without relying on theoretical preconceptions associated with specific ethnic minority populations [35]. Focus group participants understood the need to balance the cultural relevance of the intervention with the need for intervention fidelity. As a result, we believe A-SEMI can be considered what some researchers [36] refer to as a hybrid model that bridges the need for rigorous scientific research with the needs for cultural relevance in terms of intervention content and delivery.

Finally, findings regarding the primary study outcomes reinforce the need for culturally adapted interventions. Participants in the A-SEMI intervention featured significantly higher levels of safe sex and experienced greater improvements in psychosocial factors for HIV risk reduction compared to HPC participants.

## CONCLUSIONS

We can attest to the positive impact of engaging the LMW community in a CBPR process in which the beneficiaries of the proposed intervention can identify the values, traditions, and cultural experiences that are most relevant to their lives. Community members participating in the focus groups that led to the cultural adaptation of the A-SEMI intervention recognized the significance of being invited to help with the design of

an HIV prevention intervention. They expressed a sense of being empowered with a voice in the design of a science-based prevention program that also fits the LMW community's traditions, values, and needs.

We observed an increase in community awareness and in the number of members of the Latino migrant worker community who have approached Project Salud staff or any of our community partners asking about testing, resources, and referrals as a result of coming in contact with Project Salud. As evidence of the added benefit of their contribution to health promotion and disease prevention in their community continues to mount, Latino migrant workers can and should become key players toward the implementation of any CBPR-based project in the Latino migrant population of South Florida.

We also confirmed via statistical analysis our assumption that a tailored intervention that incorporated culturally adapted components and was delivered according to the specific needs of the LMW community would yield increased efficacy compared to standard interventions.

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## REFERENCES

- [1] The Hispanic population: 2010. 2010 Census Briefs. Accessed 2011 November 14. URL:  
<http://www.census.gov/prod/cen2010/briefs/c2010br-04.pdf>
- [2] HIV among Hispanic/Latino. Center for Disease Control and Prevention. Accessed 2011 August 22. URL:  
<http://www.cdc.gov/hiv/hispanics/index.htm>
- [3] HIV Behavioral Interventions for Hispanics/Latinos in the US: A Meta-Analytic Review. Center for Disease Control and Prevention. Accessed 2011 August 22 URL:  
[http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst\\_latinoconsult.pdf](http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst_latinoconsult.pdf)
- [4] Deren S, Sheldin M, Decena CU, Mino M. Research challenges to the study of HIV/AIDS among migrant and immigrant Hispanic populations in the United States. *J. Urban Health*. 2005;82(2):iii13-25.

- [5] Soskolne V, Shtarkshall RA. Migration and HIV prevention programmes: Linking structural factors, culture, and individual behaviour--an Israeli experience. *Soc Sci Med* 2002;55(8):1297-1307.
- [6] Shtarkshall, R., & Soskolne, V. Migrant populations and HIV/AIDS: The development and implementation of programmes: theory, methodology and practice. UNESCO UNAIDS, 2000.
- [7] Organista PB, Organista KC, Soloff PR. Exploring AIDS-related knowledge, attitudes, and behaviors of female Mexican migrant workers. *Health Soc. Work.* 1998;23(2):96-103.
- [8] Aranda-Naranjo B, Gaskins S. HIV/AIDS in migrant and seasonal farm workers. *J. Assoc. Nurses AIDS Care.* 1998;9(5):80-3.
- [9] Fernandez MI, Collazo JB, Hernandez N, et al. Predictors of HIV risk among Hispanic farm workers in South Florida: women are at higher risk than men. *AIDS Behav.* 2004;8(2):165-74.
- [10] Hernandez MT, Lemp GF, Castañeda X, et al. HIV/AIDS among Mexican migrants and recent immigrants in California and Mexico. *J. Acquir. Immune Defic. Syndr.* 2004; 37(4):s203-17.
- [11] Sanchez MA, Lemp GF, Rodriguez-Magis C, Bravo-Garcia W, Carter S, Ruiz JD. The epidemiology of HIV among Mexican Migrants and recent immigrants in California and Mexico. *J. Acquir. Immune Defic. Syndr.* 2004;37(4):s204-14.
- [12] Mishra SI, Conner RF. Evaluation of an HIV prevention program among Latino farmworkers. In Mishra SI, Conner RF, Magaña JR, eds. *AIDS crossing borders: The spread among migrant Latino.* Colorado: Westview Press, 1996.
- [13] Weatherby NL, McCoy HV, Bletzer KV, et al. Sexual activity and HIV among drug users: Migrant workers and their sexual partners in southern Florida. *Florida Journal of Public Health.* 1995;7(1):22-6.
- [14] McCoy HV, McCoy CB, Lai S. Effectiveness of HIV interventions among women drug users. *Women Health.* 1998;27(1-2):49-69.
- [15] Kumpfer KL, Alvarado R, Smith P, Bellamy N. Cultural sensitivity in universal family-based prevention interventions. *Prev Sci* 2002;3:241-4.
- [16] Bernal G, Saez-Santiago. Culturally centered psychosocial interventions. *J. Comm. Psych.* 2006;34:121-32
- [17] McCoy HV, McCoy CB, Lai S, et al. Behavior changes among crack-using rural and urban women. *Subst. Use Misuse.* 1999;34(4-5):667-84.
- [18] Weatherby NL, McCoy HV, Bletzer KV, et al. Immigration and HIV among migrant workers in rural southern Florida. *J. Drug Issues.* 1997;27(1):155-72.
- [19] Rao P, Hancy K, Velez M, et al. HIV/AIDS and farmworkers in the US. *Farmworker Justice*, 2008.
- [20] Organista KC, Carrillo H, Ayala G. HIV prevention with Mexican migrants. Review, critique and recommendations. *J. Acquir. Immune Defic. Syndr.* 2004;37(4):S227-39.
- [21] Vega WA, Rodriguez MA, Gruskin, E. Health disparities in the Latino population. *Epidemiol. Rev.* 2009;31:99-112.
- [22] Arcury TA, Austin CK, Quandt SA, et al. Enhancing community participation in intervention research: farmworkers and agricultural chemicals in North Carolina. *Health Educ. Behav.* 1999; 26(4):563-78.
- [23] Minkler M, Wallerstein N. eds. *Community-based participatory research for health: From process to outcomes.* 2nd Ed. San Francisco, CA: Jossey-Bass, 2008.

- [24] Rhodes SD, Hergenrather KC, Montañó J, et al. Using community-based participatory research to develop an intervention to reduce HIV and STD infections among Latino men. *AIDS Educ. Prev.* 2006;18(5):375-89.
- [25] Andrews OJ, Newman DS, Meadows O, et al. Partnership readiness for community-based participatory research. *Health Educ. Res.* 2010; PMID: 20837654.
- [26] Eisinger A, Senturia KD. Doing community-driven research: A description of Seattle partners for healthy communities. *J. Urban Health.* 2001;78(3): 519-34.
- [27] Hughes D, DuMont K. Using focus groups to facilitate culturally anchored research. *American J. Comm. Psych.* 1993;21:775-806.
- [28] Morgan, DL. The focus group guidebook. Thousand Oaks, CA: Sage, 1993.
- [29] Asbury, J. Overview of focus group research. *Qual. Health Res.* 1995;5:414-20.
- [30] Vanoss Marin, B. HIV prevention in the Hispanic community: Sex, culture, and empowerment. *J. Transcultural Nursing.* 2003;14(3):186-92.
- [31] U.S. Census Bureau. State and county quick facts, Homestead, Florida. Data derived from Population Estimates. Accessed 2011 August 22. URL: <http://quickfacts.census.gov/qfd/states/12/1232275.html>
- [32] Sánchez J, De La Rosa M, Serna CA. Project Salud: Efficacy of a community-based HIV prevention intervention for Hispanic migrant workers in South Florida. *AIDS Ed. & Prev.* (In Press).
- [33] Castro FG, Barrera M, Martinez CR. The cultural adaptation of prevention interventions: Resolving tensions between fidelity and fit. *Prev. Sci.* 2004;5:41-5.
- [34] Elliot DS, Mihalic S. Issues in disseminating and replicating effective prevention programs. *Prev. Sci.* 2004;5:47-53.
- [35] Griner D, Smith TB. Culturally adapted mental health interventions: A meta-analytic review. *Psychother.* 2006;43:531-48.
- [36] Castro FG, Hernandez-Aaron E. Integrating cultural values into drug abuse prevention and treatment with racial/ethnic minorities. *J. Drug Issues.* 2002;32:783-810.

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## PROJECT SALUD: EFFICACY OF A COMMUNITY-BASED HIV PREVENTION INTERVENTION FOR HISPANIC MIGRANT WORKERS IN SOUTH FLORIDA

**Jesús Sánchez [Associate Professor],**

Department of Sociobehavioral and Administrative Pharmacy, at Nova Southeastern University in Fort Lauderdale, Florida.

**Mario De La Rosa [Professor], and**

School of Social Work, Robert Stempel College of Public Health and Social Work, and Director, Center for Research on US Latinos, HIV/AIDS and Drug Abuse, at Florida International University in Miami.

**Claudia A. Serna [graduate student]**

Department of Health Promotion and Disease Prevention, Robert Stempel College of Public Health and Social Work, at Florida International University.

### Abstract

Project Salud evaluates the efficacy of a community-based intervention to reduce risk behaviors and enhance factors for HIV-preventative behaviors. A randomized controlled trial of 278 high risk Latino migrant workers was conducted between 2008 and 2010. Participants completed an audio computer-assisted self-interview questionnaire at baseline and 3- and 9-month post-intervention follow-ups. Participants were randomly assigned to the community-based intervention (A-SEMI) or the health promotion condition (HPC). Both interventions consisted of four 2.5-hour interactive sessions and were structurally equivalent in administration and format. Relative to the comparison condition, A-SEMI participants reported more consistent condom use, were less likely to report never having used condoms, and were more likely to have used condoms at last sexual encounter during the past 90 and 30 days. A-SEMI participants also experienced a positive change in regard to factors for HIV-preventive behaviors over the entire 9-month period. Our results support the implementation of community-based, culturally tailored interventions among Latino migrant workers.

At 16.7% of the U.S. population, Latinos are the largest and fastest growing ethnic minority in the United States (U.S. Department of Commerce, 2012). The Latino community living in the United States has been disproportionately impacted by the HIV/AIDS epidemic. The Centers for Disease Control and Prevention (CDC) estimate that Latinos accounted for 20% of new HIV infections in 2009 while they represented only 16% of the U.S. population. In 2009, Latino men accounted for 79% of new infections among all Latinos, and the rate of new infections among Latino men was two and a half times as high as that of white men (39.9 per 100,000 vs. 15.9 per 100,000). While Latina women accounted for 21% of new infections among Latinos in 2009, their rate of HIV infection was more than four times that of white women (11.8 per 100,000 vs. 2.6 per 100,000) (CDC, 2008).

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Address correspondence to Jesús Sánchez, Ph.D., Department of Sociobehavioral and Administrative Pharmacy, College of Pharmacy, Nova Southeastern University, 3200 South University Dr., Fort Lauderdale, FL 33328-2018. js2769@nova.edu.

Despite this alarming epidemiologic trend, the development, implementation, and evaluation of HIV prevention interventions designed to reduce the risk of infection among Latinos lags behind prevention efforts targeting other communities (CDC, 2008). This public health gap is even more evident when considering the sparse attention received by Latino migrant workers (LMWs) in the U.S. despite their high risk for HIV infection. Research has specifically linked migration to increased HIV incidence and vulnerability in a variety of contexts and places. First, migrant workers are a large and growing population with an estimated five million people living and working in the U.S. Second, migrant populations have a greater risk for poor health in general—and HIV infection in particular—due to circumstances including their economic transitions, decreased accessibility of health services, and complication of the host country health systems to address the needs of migrants. Third, the uniqueness of migrants often fosters a kind of ethnic/racial intolerance and hostility by the host community, which is likely to be even more severe with HIV-positive migrants, particularly in terms of stigmatization and discrimination. Thus, migrants may hide their HIV status as long as possible, making support services unavailable to them. Fourth, even if health providers were prepared to assist migrant populations, they would likely encounter great difficulties reaching out to them since many migrants live in constant fear of deportation, having no stay or work permit for the host country. Therefore, any contact with official government agencies increases that fear and is often accompanied by suspicion. Finally, compared to migrant worker populations in other areas of the United States, workers in the southeastern United States are more likely to live away from their families while doing farm and nursery work (Shtarkshall & Soskolne, 2000; Soskolne & Shtarkshall, 2002).

The few available studies on HIV transmission and prevention specifically conducted among LMWs highlight the role played by risk factors such as inadequate or incorrect HIV transmission knowledge, limited access to HIV risk reduction information, unprotected sexual practices, alcohol and other drug use, cultural and gender roles, and immediate survival problems (i.e., housing and employment) (Aranda-Naranjo & Gaskins, 1998; Fernández et al., 2004; Hernández et al., 2004; Organista, Organista & Soloff, 1998; Sanchez et al., 2004). While these studies have made a critical contribution to advance our understanding of the Latino migrant population in the U.S. and highlight numerous potential differences between this and other populations, their HIV prevention interventions have demonstrated only limited effectiveness and documented a critical need for tailoring effective HIV prevention interventions for the Latino migrant population (McCoy, McCoy, & Lai, 1998; McCoy, McCoy, Lai, Weatherby, & Messiah, 1999; Mishra & Conner, 1996; Weatherby et al., 1995, 1997). These adaptations, however, cannot be limited to the cultural translation of existing interventions as they would not be responsive to the cultural uniqueness of Latino migrant populations. The development of new interventions to address HIV prevention in Latino migrant communities needs to take into account their specific circumstances as well as their traditional mistrust of conventional research, which they view as paternalistic and irrelevant to their needs. Consequently, culturally adapted interventions must prompt community engagement and participation at every phase of the program if they do not want to remain culturally blind. Latino migrant workers are most likely to benefit from HIV prevention efforts when these efforts are supported at the community level, sustained over time, and other needs in the community are also addressed. The purpose of this article is to extend current knowledge about sexually related risk factors for HIV infection and report on the efficacy of a community-based HIV prevention pilot intervention in reducing risky sexual behaviors and enhancing factors (i.e., HIV knowledge) for HIV-preventive behaviors among Latino migrant workers.

Project Salud—officially entitled “HIV Risk Reduction Among High Risk Latino Migrant Workers in South Florida”—was a 3-year study funded by the National Institute on Minority

Health and Health Disparities as part of C-Salud, a P20 Exploratory Center of Excellence at Florida International University. Project Salud was conceived as a community-based participatory research (CBPR) project with the goal of engaging the LMW community in the Homestead/Florida City area in the development and implementation of a culturally tailored HIV prevention intervention. By framing Project Salud within the CBPR approach, this study responded to the National Institutes of Health (NIH) priority on establishing equitable partnerships between community members and researchers, with the final goal of increasing community participation in all stages of the research process, improving community health, and reducing HIV-related health disparities.

The main objective of Project Salud was to assess the differential efficacy of an Adapted Stage-Enhanced Motivational Interviewing (A-SEMI) condition compared to a Health Promotion Comparison (HPC) condition for producing reductions in HIV risk and increased health behaviors among LMWs. The design of the A-SEMI intervention is considered to be an enhancement over existing cognitive behavioral risk reduction approaches because A-SEMI integrates key contextual components from effective HIV prevention interventions (i.e., peer counseling) linked to maintenance of risk reduction effects. The A-SEMI intervention was culturally adapted in collaboration with the LMW community. Eight focus groups consisting of 83 community members and key community partners were conducted at the offices of the Farmworkers Association of Florida (FWAF) to discuss the factors that increased their HIV risks. Data obtained from the focus groups along with the existing body of literature informed the development of a culturally tailored intervention (A-SEMI) that reflected their cultural background, living conditions, and lifestyle, and was likely to be adopted by the community (Sanchez, Serna & De La Rosa, 2012).

Focus groups provide several advantages over the conventional methods in instrument development. First, focus groups are useful for developing insights into the perceptions and points of view of persons who have some common characteristics related to the research topic and for appreciating the variation in people's experiences (Morgan, 1993). The resulting intervention is more likely to be grounded in the experiences of the population under study. Generating knowledge from focus groups can provide reasonable assurance that the instrument is culturally anchored. Second, focus groups inform researchers about the language and terminology that particular groups of people use regarding the construct under study (Morgan, 1993). By preserving the terminology from the focus group, items included in the intervention may reflect the language of the population of interest. Third, the focus groups' social nature often stimulates stories and insights that would be missed otherwise (Asbury, 1995). Focus groups also reinforced the importance of getting community members involved in all stages of the study. Accordingly, we initiated a training program to train community members as community health workers (CHWs). Two CHWs played a key role as outreach workers and interviewers while four different CHWs delivered both interventions. A detailed description of this training program is described in a recently published article (Sanchez, Silva-Suarez, Serna, & De La Rosa, 2012).

The design of the A-SEMI intervention was guided by the theoretical foundations of social cognitive theory (Bandura, 1994), enhanced with peer education and motivational-enhancing therapy, with the objective of producing a stronger, more sustained HIV risk reduction effect among LMWs. Two trained CHWs delivered A-SEMI in Spanish during four 2.5-hour interactive group sessions that took place at the FWAF office in Homestead, Florida, on two consecutive weekends. Based on their schedule, group participants decided whether they wanted to have two sessions—one in the morning and one in the afternoon—on the same day (i.e., Sunday) or on different days (i.e., one session on Saturday and another on Sunday). On average, each group was composed of six participants. Session 1 of A-SEMI focused on developing group cohesion and addressing HIV education. Session 2 was devoted to

motivational enhancement and goal setting. Study subjects were helped in developing a specific and relevant personal risk-reduction plan that could be realistically accomplished with a sense of mastery and success. Session 3 focused on increasing commitment to and empowerment for safer sex. Session 4 focused on identifying high risk situations and negotiation skills through problem solving, assertiveness, and communication.

A Peer Counseling Intervention Component (PCIC) was integrated into the A-SEMI. PCIC has been employed in a number of effective HIV intervention studies (Baldwin, 1995; Latkin, 1998; Morisky, Ang, Coly, & Tiglao, 2004; Morisky & Ebin, 2000; Pearlman, Camberg, Wallace, Symons, & Finison, 2002). One of the strongest theoretical factors to a PCIC approach involves peer credibility. Community members—especially in isolated and hard to reach social environments—identify their peers as reliable and preferred sources of information on sexuality-related topics, including sexually transmitted infections and HIV. As a result, peers are more effective educators and yield higher levels of commitment.

Motivational Enhancing Therapy (MET) has been integrated into effective interventions for reducing substance abuse and HIV risk behaviors (Kalichman, Somlai, & Sikkema, 2001; Miller & Rollnick, 2002). Existing studies revealed that in many instances participants could demonstrate adequate post-intervention skills and knowledge associated with reducing risk, but lacked the motivation to actually do so. This evidence prompted us to incorporate MET strategies into A-SEMI. One added MET component is the provision of normative feedback. Based on the baseline assessment, normative feedback will be offered to assist A-SEMI participants in identifying reasons for changing HIV attitudes and risk behavior, and in eliciting self-motivating statements. This addition was based on Kalichman and colleagues' (Kalichman, Cherry & Browne-Sperling, 1999; Kalichman et al., 2001) adaptation for group administration of the MET normative feedback technique for HIV prevention. The influence of MET is also reflected in A-SEMI, which throughout places great emphasis on actively engaging participants in developing their own risk-reduction strategies and hierarchies of safety, rather than prescribing specific strategies as in more traditional cognitive behavioral interventions. When participants actively choose and develop risk-reduction strategies, this tends to increase personal involvement and the motivation to change (Miller & Rollnick, 2002).

For instance, Session 2 began with a brief review of Session 1 during which CHWs had initiated a discussion about ways to prevent HIV infection, including the use of condoms. Group members were provided with feedback that included their responses to the condom attitude measure collected at baseline. Condom attitudes were discussed via group activities that allowed participants to sort those attitudes into pros and cons of condom use. CHWs utilized the negative aspects of condom use as examples for the problem-solving skills addressed during Session 4.

The Health Promotion Condition (HPC) served as the comparison condition and targeted specific health issues of special relevance to LMWs, including general health strategies such as hygiene and living in crowded conditions, first aid, and skin problems. A-SEMI and HPC were structurally equivalent in administration, time, and format. They also were designed to be of a similar level of interest. Both interventions were guided by a written manual and were held in the same community setting, with refreshments/snacks and identical compensation for participation. In addition, equal quality control provisions were used, particularly regarding the need to verify that both interventions were delivered as designed (intervention fidelity), which was stressed during training and at the beginning of each session. All intervention sessions were digitally recorded by an attending staff member. A structured coding system was created and used to determine fidelity based on the digital recordings. The staff member also took notes during the sessions that were utilized to ensure

fidelity. Recordings and notes were reviewed by the project staff and discussed during biweekly meetings to ensure fidelity and to provide feedback to project staff.

## METHODS

### STUDY POPULATION

In order to be eligible for the study, potential participants had to meet the following eligibility criteria: (1) be of Latino origin; (2) 18 years of age or older; (3) have a “farm card”; (4) self-reported one or more episodes of unprotected sex in the past three months; (5) willing to be randomized to treatment and contacted for follow-up assessments; (6) likely to be in the general geographic area for six months; and (7) able to understand and provide written informed consent.

From November 2008 through March 2010, outreach workers screened 407 LMWs who were recruited by means of a stratified network-based (snowball) sampling design (Watters and Biernaki, 1989) from neighborhoods and migrant camps in the Homestead/Florida City area in South Florida, which is known for its high concentration of LMWs. Of these, 290 (70%) LMWs met eligibility criteria and consented to participate in the study. Of those who were ineligible, 53% were not sexually active or engaged in safe sex all the time, 21% were out of the age range, 16% were not likely to be in the target geographical area, and 10% declined to participate. All data collection and interventions took place in the Homestead office of the FWAF. Transportation and snacks were provided at every session. This study was approved by the Institutional Review Board (IRB) Human Subjects Office at Florida International University.

### PROCEDURES

Assessments were conducted at baseline and at 3- and 9-month intervention follow-ups. Data were collected via an audio computer-assisted self-interview (ACASI) with the purpose of enhancing confidentiality among participants as well as increasing comprehension among participants with low literacy. A project staff member was always available during data collection to assist participants with any questions and/or technical difficulties. Each assessment was conducted in Spanish and took approximately 90 minutes. A project staff member secured the interview data as soon as participants had finished the assessment. Following the baseline assessment, participants were randomly assigned to the A-SEMI or HPC interventions using a computer-generated randomization table. Following each assessment and intervention session, participants received a monetary incentive as approved by the IRB.

### MEASURES

Self-reported consistent condom use, the primary outcome, was defined as use of a condom during every episode of vaginal intercourse in the 30 days and 90 days prior to baseline and at the 3- and 9-month follow-up assessments. We selected consistent condom use during vaginal intercourse as the primary outcome for the study because of its demonstrated effectiveness against HIV transmission (De Vicenzi, 1994; Saracco et al., 1993). We decided to assess vaginal sex based on its significantly higher prevalence at baseline compared to anal sex (only 15.8% of female participants and 4.1% of male participants self-reported having engaged in anal sex during the last 3 months prior to baseline assessment) and its higher risk for HIV infection compared to oral sex (CDC, 2009). Other self-reported behavioral outcomes were never using condoms and condom use at last sexual encounter. Several techniques were utilized to enhance the validity of participants’ self-reported sexual behaviors. Calendaring techniques and consistency checks were used to enhance accurate recall.

Psychosocial variables were derived from the underlying theoretical frameworks and a review of the empirical literature. Constructs were assessed using scales with acceptable psychometrics previously used in similar studies (Marin, Gomez, Tschann, & Gregorich, 1997, 1998; Sikkema et al., 2000; St. Lawrence et al., 1999; Wingood & DiClemente, 1998). Traditional view of gender roles was measured with a gender roles scale comprising 10 items, with higher scores indicating a less traditional view of gender roles ( $\alpha = .70$ ). HIV prevention knowledge was measured using an 8-item scale ( $\alpha = .78$ ), with higher scores indicating greater knowledge about HIV. Perceived barriers to condom use were measured using a 29-item scale ( $\alpha = .95$ ), with higher scores indicating fewer perceived barriers. Condom use self-efficacy was measured with a 9-item scale ( $\alpha = .90$ ) reflecting participants' confidence in their ability to properly use condoms, with higher scores indicating greater self-efficacy.

## DATA ANALYSIS

Analyses were performed using an intent-to-treat protocol in which participants were analyzed in their original assigned study conditions irrespective of the number of sessions attended (Piantadosi, 1997; Pocock, 1993). Baseline differences between participants in the two interventions on sociodemographic, behavioral, and psychological variables with  $p$  values of .05 or lower were considered significant for purposes of identifying potential covariates. We assessed differences between interventions with the  $t$ -test for continuous variables and  $\chi^2$  analysis for categorical variables. Of these variables, only having a primary physician was statistically significant. Overall, the majority of participants (75.5%,  $n = 210$ ) did not have a primary physician. At baseline, 64.3% ( $n = 90$ ) of participants randomized to A-SEMI and 87% ( $n = 120$ ) of participants randomized to HPC did not have a primary physician. Because of the significant difference between participants in the two interventions in the prevalence of primary physician at baseline ( $p < .001$ ), we included this variable as a covariate in all subsequent data analyses.

We assessed the intervention effects of A-SEMI from baseline to the 3-month follow-up, from the 3-month follow-up to the 9-month follow-up, and for the entire 9-month period from baseline to the 9-month follow-up. We analyzed the intervention effects for each assessment period with logistic regression to compute adjusted odds ratios (AORs) for dichotomous outcomes and linear regression to compute adjusted means and mean differences for continuous variables (Hosmer & Lemeshow, 1989; Kleinbaum, Kupper, Muller, & Nizam, 1998). Each regression model included the corresponding baseline measure as a covariate in the analysis as well as a measure of intraclass correlation.

To assess the A-SEMI intervention effects for the entire 9-month follow-up period, we utilized logistic and linear generalized estimating equation regression models to control for repeated within-person measurements (Hardin & Hilbe, 2003; Liang & Zeger, 1986). These models incorporated the study conditions as well as covariates and outcomes. We adjusted models for the corresponding baseline measure and covariates to obtain AORs and adjusted mean differences. We also computed the 95% confidence interval (CI) and the corresponding  $p$  value. For each model, we calculated adjusted means and standard errors. We calculated percentage relative change for continuous variables as the difference between the adjusted means for each condition divided by the adjusted mean for the comparison condition.

## RESULTS

Of the 290 randomized participants, 145 were allocated to the A-SEMI intervention and the other 145 to the HPC intervention. Data on 12 study participants were incomplete and therefore not included in data analysis. As a result, results are based on the remaining 278

study participants, of which 140 were assigned to the A-SEMI intervention and 138 to the HPC intervention.

Table 1 contains a description of the 278 participants in the sample by intervention group. Study participants were 54.3% male. Mean age at baseline was 37.2 years ( $SD = 5.88$ ). Mexico represented the largest group (43.2%) by country of origin, followed by Guatemala (20.1%), Honduras (10.1%), and others (26.6%). Slightly more than one-quarter of participants (27.7%) did not have any formal education and more than two-thirds (68.7%) had not graduated from high school. A large majority (88.1%) of study participants did not have health insurance and slightly more than three-quarters (75.5%) did not have a primary physician. Almost two-thirds (61.9%) of study participants reported not having received needed medical care in the last 12 months. During the last year prior to baseline assessment, study participants reported having an average of 3.15 sexual partners ( $SD = 1.8$ ). Almost half (48.6%) of the sample reported having only one sexual partner. However, in the past 90 days, most participants (77.6%) reported having only one sexual partner, who was often (61.1%) described as a main sexual partner. No significant differences were observed across gender.

In both interventions, 94% of the curricula activities were conducted according to protocol. Participants' attendance was high: 88.3% ( $n = 128$ ) of participants completed all four A-SEMI sessions, and 86.2% ( $n = 125$ ) completed all four HPC sessions. On a 7-point scale, study participants in both interventions reported comparable high satisfaction ratings (A-SEMI mean = 6.3,  $SD = 0.22$  vs. HPC mean = 6.14,  $SD = .37$ ). We found no significant differences in attrition across the two interventions (A-SEMI 3-month assessment = 91.1%, 9-month assessment = 88.3% vs. HPC 3-month assessment = 88.7%, 9-month assessment = 86.2%). We strongly believe that our partnership with the FWAFF and the fact that all study-related activities were conducted at their Homestead office contributed to the study's high retention rates.

Effects of the intervention on the primary outcome, consistent condom use, and other dichotomous outcomes are presented in Table 2. These analyses were performed separately at the 3-month assessment (baseline to 3-month assessment), at the 9-month assessment (3- to 9-month assessment), and over the entire 9-month assessment (baseline to 9-month assessment). Over the entire 9-month follow-up period, A-SEMI participants were 4.6 times as likely as HPC participants to report using condoms consistently during the past 90 days ( $p < .001$ ) and 3 times as likely to report using condoms consistently during the past 30 days ( $p < .001$ ). Similarly, over the entire 9-month follow-up period, A-SEMI participants were 55% less likely compared to HPC participants to report never having used condoms during the past 90 days (AOR = 0.45; 95% CI = 0.27, 0.80) and 49% less likely to report never having used condoms during the last 30 days (AOR=0.51; 95% CI = 0.28, 0.93). Finally, A-SEMI participants were 2.6 times more likely to report using condoms at last sexual encounter ( $p < .001$ ) compared to HPC participants.

The effects of the hypothesized psychosocial factors for HIV risk reduction behaviors are presented in Table 3. We observed that psychosocial factors for HIV risk reduction behaviors experienced a positive change over the entire 9-month follow-up period. A-SEMI participants reported fewer traditional views of gender roles ( $p = .006$ ) than did HPC participants. They also featured higher HIV knowledge ( $p = .009$ ) and reported fewer perceived barriers to condom use ( $p < .001$ ) and greater condom use self-efficacy ( $p < .001$ ).

## DISCUSSION

Most of the few HIV prevention interventions that target LMWs were initially developed for nonmigrant populations and eventually adapted to target this community (Painter, Organista, Rhodes & Sañudo, 2012). The existing literature identifies only three interventions that were specifically developed to address HIV prevention among LMWs and demonstrated some degree of efficacy (Painter, Organista, Rhodes & Sañudo, 2012). Project Salud makes a significant contribution to this limited body of literature by developing—in close collaboration with the LMW community—a culturally tailored HIV prevention intervention (A-SEMI) that addressed the specific needs of the community. Over the entire 9-month period, promising A-SEMI intervention effects were observed for consistent condom use over the last 90 and 30 days prior to assessment. Similarly, positive intervention effects were observed for never having used condoms over the last 90 and 30 days prior to assessment, and using a condom at their last sexual encounter. We also observed favorable changes in hypothesized psychosocial factors for HIV risk reduction over the 9-month follow-up period.

The success of the A-SEMI intervention may be attributable to several factors. A review of various studies (Herbst et al., 2007) underlined the importance of using trained community members as health educators to implement HIV sexual risk reduction interventions. Our results reinforce this finding by describing how community members were trained as community health workers and played a key role in administering the interventions. These CHWs delivered the intervention curriculum with outstanding fidelity and received very positive ratings from study participants. The observed improvements may also be partly attributable to the adaptation of the intervention to highlight the underlying cultural background, living conditions, and lifestyle of the LMW community. This community background was integrated into the different phases of the study, from recruitment and retention of study participants to the administration of questionnaires and interventions. Moreover, community members and partners were deeply involved and played a key role at every stage of the study. Without their collaboration, this study would have not been possible.

This study is not without limitations. First, the study did not test participants for HIV and other STIs. Prevalence and incidence information among LMWs is very sparse, and this study could have made a significant contribution in that regard. However, community members and partners considered that making HIV testing an eligibility criterion would have compromised participation and interfered with the process of gaining trust in the community. A second methodological concern is the fact that behavioral risk data in the study were self-reported and subject to recall bias. We attempted to minimize this concern through the use of calendaring techniques designed to maximize recall (McElrath, Chitwood, Griffin, & Comerford, 1994). Moreover, prior research has established the validity and reliability of self-reported risk behaviors (Jaccard & Wan, 1995; Miller, Turner & Moses, 1990; Ochs & Binik, 1999). Third, this study does not claim to be representative of all LMWs in South Florida because it is impossible to enumerate this population and sample it in a random manner. We attempted to increase the representativeness of the sample by selecting study participants from different neighborhoods and camps within the Homestead/Florida City area.

Project Salud demonstrated the feasibility of developing and delivering a brief HIV prevention intervention to LMWs, traditionally considered a hard to access population at high risk for HIV infection. This study has laid the groundwork for a more comprehensive study that will test the efficacy of Project Salud to promote long-term behavioral changes among this population. Project Salud will also benefit from adopting a socioenvironmental

framework in which HIV-related risk behaviors are embedded within the dynamic interplay of key social, environmental, and individual factors. Finally, Project Salud will conduct testing for HIV and other STIs to assess objective biological outcomes that estimate incident infection rates as well as intervention efficacy.

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## REFERENCES

- Aranda-Naranjo B, Gaskins S. HIV/ AIDS in migrant and seasonal farm workers. *Journal of the Association of Nurses in AIDS Care*. 1998; 9(5):80–83. [PubMed: 9742483]
- Asbury J. Overview of focus group research. *Qualitative Health Research*. 1995; 5:414–420.
- Baldwin J. Using peer education approaches in HIV/AIDS programs for youth: A review of the literature. *Peer Facilitator Quarterly*. 1995; 12:34–37.
- Bandura, A. Social cognitive theory and exercise of control over HIV infection. In: DiClemente, R.J.; Peterson, J., editors. *Preventing AIDS: Theories and methods of behavioral interventions*. Plenum; New York: 1994. p. 25-59.
- Centers for Disease Control and Prevention. [Retrieved January 15, 2013] HIV behavioral interventions for Hispanics/Latinos in the US: A meta-analytic review. 2008. from [http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst\\_latinoconsult.pdf](http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst_latinoconsult.pdf)
- Centers for Disease Control and Prevention. [Retrieved January 17, 2013] Oral sex and HIV risk. 2009. from <http://www.cdc.gov/hiv/resources/factsheets/PDF/oralsex.pdf>
- De Vicenzi I. A longitudinal study of human immunodeficiency virus transmission by heterosexual partners. *New England Journal of Medicine*. 1994; 331:341–346. [PubMed: 8028613]
- Fernández MI, Collazo JB, Hernández N, Bowen GS, Varga LM, Vila CK, Perrino T. Predictors of HIV risk among Hispanic farm workers in South Florida: Women are at higher risk than men. *AIDS and Behavior*. 2004; 8(2):165–174. [PubMed: 15187478]
- Hardin, JW.; Hilbe, JM. *Generalized estimating equations*. Chapman & Hall/CRC; New York: 2003.
- Herbst JH, Kay LS, Passin WF, Lyles CM, Crepez N, Marin BV. A systematic review and meta-analysis of behavioral interventions to reduce HIV risk behaviors of Hispanics in the United States and Puerto Rico. *AIDS and Behavior*. 2007; 11(1):25–47. [PubMed: 16917668]
- Hernández MT, Lemp GF, Castañeda X, Sanchez MA, Aoki BK, Tapia-Conyer R, Drake MV. HIV/ AIDS among Mexican migrants and recent immigrants in California and Mexico. *Journal of Acquired Immune Deficiency Syndromes*. 2004; 37(4):s203.
- Hosmer, DW.; Lemeshow, SL. *Applied logistic regression*. Wiley; New York: 1989.
- Jaccard J, Wan CK. A paradigm for studying the accuracy of self-reports of risk behavior relevant to AIDS: Empirical perspectives on stability, recall bias, and transitory influences. *Journal of Applied Social Psychology*. 1995; 25:1831–1858.
- Kalichman SC, Cherry C, Browne-Sperling F. Effectiveness of a video-based motivational skills-building HIV risk-reduction intervention for inner-city African American men. *Journal of Consulting and Clinical Psychology*. 1999; 67:959–966. [PubMed: 10596517]
- Kalichman, S.; Somlai, A.; Sikkema, K. Community involvement in HIV-AIDS prevention. In: Schneiderman, N.; Spears, MA.; Silva, JM.; Tomes, H.; Gentry, JH., editors. *Integrating behavioral and social sciences with public health*. American Psychological Association; Washington, DC: 2001. p. 85-102.
- Kleinbaum, DG.; Kupper, LL.; Muller, KE.; Nizam, A. *Applied regression analysis and other multivariable methods*. 3rd ed. Duxbury; New York: 1998.
- Latkin CA. Outreach in natural settings: The use of peer leaders for HIV prevention among injecting drug users' networks. *Public Health Reports*. 1998; 113(Suppl. 1):151–159. [PubMed: 9722820]

- Liang KY, Zeger SL. Longitudinal data analysis using generalized linear models. *Biometrika*. 1986; 73(1):13–22.
- Marin BV, Gomez CA, Tschann JM, Gregorich SE. Condom use in unmarried Latino men: A test of cultural constructs. *Health Psychology*. 1997; 16(5):458–467. [PubMed: 9302543]
- Marin BV, Gomez CA, Tschann JM, Gregorich SE. Self-efficacy to use condoms in unmarried Latino adults. *American Journal of Community Psychology*. 1998; 26(1):53–71. [PubMed: 9574498]
- McCoy HV, McCoy CB, Lai S. Effectiveness of HIV interventions among women drug users. *Women's Health*. 1998; 27(1-2):49–69.
- McCoy HV, McCoy CB, Lai S, Weatherby NL, Messiah S. Behavior changes among crack-using rural and urban women. *Substance Use & Misuse*. 1999; 34(4-5):667–684. [PubMed: 10210099]
- McElrath K, Chitwood DD, Griffin DK, Comerford M. Consistency of self-reported HIV risk behavior among injecting drug users. *American Journal of Public Health*. 1994; 84:1965–1970. [PubMed: 7998638]
- Miller, WR.; Rollnick, S. *Motivational interviewing: Preparing people for change*. Guilford; New York: 2002.
- Miller, HG.; Turner, CF.; Moses, LE. *AIDS: The second decade*. Academy Press; Washington, DC: 1990.
- Mishra, SI.; Conner, RF. Evaluation of an HIV prevention program among Latino farmworkers. In: Mishra, SI.; Conner, RF.; Magaña, JR., editors. *AIDS crossing borders: The spread among migrant Latinos*. Westview; Boulder, CO: 1996. p. 3-24.
- Morgan, DL. *The focus group guidebook*. Sage; Thousand Oaks, CA: 1993.
- Morisky DE, Ang A, Coly A, Tiglaio TV. A model HIV/AIDS risk reduction program in the Phillipines: A comprehensive community-based approach through participatory action research. *Health Promotion International*. 2004; 19(1):69–76. [PubMed: 14976174]
- Morisky, DE.; Ebin, VJ. The effectiveness of peer education STD/HIV prevention. In: Alex, S.; Kar, S.; Alcalay, R., editors. *Health communication: A multicultural perspective*. Sage; Thousand Oaks, CA: 2000. p. 211-234.
- Ochs EP, Binik YM. The use of couple data to determine the reliability of self-reported sexual behavior. *Journal of Sex Research*. 1999; 36:374–384.
- Organista PB, Organista KC, Soloff PR. Exploring AIDS-related knowledge, attitudes, and behaviors of female Mexican migrant workers. *Health & Social Work*. 1998; 23(2):96–103. [PubMed: 9598392]
- Painter, TM.; Organista, KC.; Rhodes, SD.; Sañudo, FM. Interventions to prevent HIV and other sexually transmitted diseases among Latino migrants. In: Organista, KC., editor. *HIV prevention with Latinos: Theory, research, and practice*. Oxford University Press; New York: 2012. p. 351-381.
- Pearlman DN, Camberg L, Wallace LJ, Symons P, Finison L. Tapping youth as agents for change: Evaluation of a peer leadership HIV/AIDS intervention. *Journal of Adolescent Health*. 2002; 31(1):31–39. [PubMed: 12090963]
- Piantadosi, S. *Clinical trials: A methodologic perspective*. Wiley; New York: 1997.
- Pocock, SJ. *Clinical trials*. Wiley; New York: 1993.
- Sanchez J, Serna CA, De La Rosa M. Project Salud: Using community-based participatory research to culturally adapt an HIV prevention intervention in the Latino migrant worker community. *International Journal of Public Health*. 2012; 4(3):301–308.
- Sanchez MA, Lemp GF, Rodriguez-Magis C, Bravo-Garcia W, Carter S, Ruiz JD. The epidemiology of HIV among Mexican migrants and recent immigrants in California and Mexico. *Journal of Acquired Immune Deficiency Syndromes*. 2004; 37(4):s204–214. [PubMed: 15722863]
- Sanchez J, Silva-Suarez G, Serna CA, De La Rosa M. The Latino migrant worker HIV prevention program. *Family & Community Health*. 2012; 35(2):139–146. [PubMed: 22367261]
- Saracco A, Musicco M, Nicolosi A, Angarano G, Arici C, Gavazzeni G, Lazzarin A. Man-to-woman sexual transmission of HIV: Longitudinal study of 343 steady partners of infected men. *Journal of Acquired Immune Deficiency Syndromes*. 1993; 6:497–502. [PubMed: 8097789]

- Shtarkshall, R.; Soskolne, V. Migrant populations and HIV/AIDS: The development and implementation of programmes: Theory, methodology and practice. UNESCO UNAIDS; Geneva and Paris: 2000.
- Sikkema KJ, Kelly JA, Winett RA, Solomon LJ, Cargill VA, Roffman RA, Mercer MB. Outcomes of a randomized community-level HIV prevention intervention for women living in 18 low-income housing developments. *American Journal of Public Health*. 2000; 90(1):57–63. [PubMed: 10630138]
- Soskolne V, Shtarkshall RA. Migration and HIV prevention programmes: Linking structural factors, culture, and individual behaviour—An Israeli experience. *Social Science & Medicine*. 2002; 55(8):1297–1307. [PubMed: 12231010]
- St. Lawrence JS, Chapdelaine AP, Devieux JG, O'Bannon RE 3rd, Brasfield TL, Eldridge GD. Measuring perceived barriers to condom use: Psychometric evaluation of the condom barriers scale. *Assessment*. 1999; 6(4):391–404. [PubMed: 10539985]
- U.S. Department of Commerce. [Retrieved January 15, 2013] United States Census Bureau: State and County Quick Facts. 2012. from <http://quickfacts.census.gov/qfd/states/00000.html>
- Watters J, Biernacki P. Targeted sampling: Options for the study of hidden populations. *Social Problems*. 1989; 36:416–430.
- Weatherby NL, McCoy HV, Forney MA, Bletzer KV, Inciardi JA, McBride DC. Sexual activity and HIV among drug users: Migrant workers and their sexual partners in southern Florida. *Florida Journal of Public Health*. 1995; 7(1):22–26.
- Weatherby NL, McCoy HV, Bletzer KV, McCoy CV, Inciardi JA, McBride DC, Forney MA. Immigration and HIV among migrant workers in rural southern Florida. *Journal of Drug Issues*. 1997; 27(1):155–172.
- Wingood GM, DiClemente RJ. Partner influences and gender-related factors associated with noncondom use among young adult African-American women. *American Journal of Community Psychology*. 1998; 26(1):29–51. [PubMed: 9574497]

TABLE 1

## Characteristics of Study Participants by Intervention

Characteristics	A-SEMI (n = 140)	HPC (n = 138)	Total (n = 278)
	%	%	%
Gender			
Male	52.1	56.3	54.3
Female	47.9	43.7	45.7
Age, mean (SD)	36.6 (4.41)	39.4 (3.91)	37.2 (5.88)
Country of Origin			
Mexico	44.2	42.0	43.2
Guatemala	18.6	21.8	20.1
Honduras	10.7	9.4	10.1
Others	26.5	26.8	26.6
Education			
No formal education	28.6	26.8	27.7
< High School degree	66.4	71.0	68.7
> High School degree	5.0	2.2	3.6
Health Insurance			
No	85.7	90.6	88.1
Yes	14.3	9.4	11.9
Primary Physician*			
No	64.3	87.0	75.5
Yes	35.7	13.0	24.5
Received Medical Care when needed in last 12 months			
No	58.6	65.2	61.9
Yes	41.1	34.8	38.1
Number of Sexual Partners in 90 days prior to Baseline			
1	74.3	81.2	77.6
2 or more	25.7	18.8	22.4

\*  $p < .001$ .

**TABLE 2**

Effects of A-SEMI and HPC Interventions for Latino Migrant Workers on Condom Use Behaviors

Behavior	Baseline Assessment <sup>a</sup>		3-Month Assessment <sup>a</sup>				9-Month Assessment <sup>a</sup>				GEE Model Baseline to 9-Month Assessment	
	A-SEMI %	HPC %	A-SEMI %	HPC %	AOR <sup>b</sup> (95% CI)	<i>p</i>	A-SEMI %	HPC %	AOR (95% CI)	<i>p</i>	AOR (95% CI)	<i>p</i>
Consistent Condom Use												
Past 90 days	5.2	5.6	45.3	17.4	5.28 [2.33, 13.58]	< .001	38.2	15.4	4.66 [2.18, 9.96]	< .001	4.62 [2.37, 9.67]	< .001
Past 30 days	10.4	9.8	51.6	23.8	3.03 [1.65, 7.14]	0.004	44.5	24.5	3.33 [1.58, 7.12]	< .001	3.03 [1.65, 5.52]	< .001
Never Used Condoms												
Past 90 days	63.1	66	23.5	41.2	0.29 [0.13, 0.74]	0.006	32.1	45.7	0.51 [0.23, 0.99]	0.05	0.45 [0.27, 0.80]	0.008
Past 30 days	70.5	73.1	30.7	49.1	0.58 [0.24, 0.82]	0.005	36.6	48.4	0.46 [0.26, 1.02]	0.06	0.51 [0.28, 0.93]	0.02
Condom Use at Last Sexual Encounter	14.8	17.2	59.3	31.6	3.49 [1.77, 6.86]	< .001	50.3	34.6	2.03 [1.10, 3.51]	0.02	2.61 [1.58, 4.59]	< .001

<sup>a</sup>Note. Unadjusted proportions.

<sup>b</sup>Adjusted for Baseline value of the outcome variable and having a primary physician; HPC (comparison intervention) was the referent for computing the AOR.

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**TABLE 3**

Effects of A-SEMI and HPC Interventions for Latino Migrant Workers on Psychosocial Mediators of Preventive Behavior, Baseline to 9-Month Assessment

Mediator	Baseline Assessment		GEE Model Baseline to 9-Month Assessment	
	A-SEMI	HPC	Relative Change <sup>a</sup>	P
	Unadjusted	Unadjusted		
	Mean (SD)	Mean (SD)	% (95% CI)	
Traditional View of Gender Roles (range = 10–40)	21.42 (4.53)	20.12 (3.86)	5.14 (3.40, 6.43)	0.006
HIV Prevention Knowledge (Range = 1–8)	6.19 (1.11)	6.34 (1.08)	2.82 (1.65, 4.06)	0.009
Perceived Barriers to Condom Use (Range = 29–116)	67.15 (14.86)	65.16 (13.39)	13.03 (8.65, 9.12)	<.001
Condom Use Self-Efficacy (Range = 9–27)	20.57 (4.02)	19.88 (5.13)	9.78 (7.14, 11.66)	<.001

<sup>a</sup>Note. Relative Change = (Mean difference between A-SEMI and HPC/mean for HPC × 100%) and 95% CI around the relative change.

# The Latino Migrant Worker HIV Prevention Program

## Building a Community Partnership Through a Community Health Worker Training Program

Jesús Sánchez, PhD; Georgina Silva-Suarez, MPH;  
 Claudia A. Serna, MPH; Mario De La Rosa, PhD

There is limited information on the impact of the HIV/AIDS epidemic on Latino migrant workers (LMWs), although available data indicate that this community is being disproportionately affected. The need for prevention programs that address the specific needs of LMWs is becoming well recognized. HIV prevention interventions that train and employ community health workers are a culturally appropriate way to address the issues of community trust and capacity building in this community. This article describes the Latino Migrant Worker HIV Prevention Program and its efforts to train and engage community health workers in the prevention of HIV among LMWs in South Florida. **Key words:** *community-based participatory research, HIV/AIDS, HIV prevention programs, Latino migrant workers*

**T**HE Latino community living in the United States has been disproportionately impacted by the HIV/AIDS epidemic.<sup>1</sup> Furthermore, the development, implementation, and

evaluation of HIV prevention interventions designed to reduce the risk of infection among Latinos lag behind prevention efforts targeting other communities.<sup>2</sup> This public health gap is even more evident when considering the sparse attention received by Latino migrant workers (LMWs) in the United States despite their high risk for HIV infection. Research has specifically linked migration to increased HIV incidence and vulnerability in a variety of contexts and places. First, migrant workers are a large and growing population with an estimated 125 million people living and often working outside their country of citizenship, whereas between 2 million and 4 million migrate permanently each year. Second, migrant populations have a greater risk for poor health in general and HIV infection in particular due to circumstances, including their economic transitions, decreased accessibility of health services, and the complication of the host country health systems to address the needs of migrants. Third, the uniqueness of migrants often fosters a kind of ethnic/racial intolerance and hostility by the host community, which is likely to be even more severe with HIV-positive

**Author Affiliations:** *Department of Sociobehavioral and Administrative Pharmacy, College of Pharmacy, Nova Southeastern University, Fort Lauderdale, Florida (Dr Sánchez); Department of Health Promotion and Disease Prevention (Mrs Silva-Suarez and Serna) and School of Social Work (Dr De La Rosa), Robert Stempel College of Public Health and Social Work, Florida International University, Miami.*

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[AQ3]

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**Correspondence:** *Jesús Sánchez, PhD, Department of Sociobehavioral and Administrative Pharmacy, College of Pharmacy, Nova Southeastern University, 3200 S University Dr, Fort Lauderdale, FL 33328 (js2769@nova.edu).*

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migrants, particularly regarding stigmatization and discrimination. Thus, migrants may further hide their HIV status as long as possible, thus making support services unavailable for them. Fourth, even if health providers were prepared to assist migrant populations, they would likely encounter great difficulties to reach out to them. Many migrants live in constant fear of deportation, having no stay or work permit for the host country. Therefore, any contact with official government agencies increases that fear and is often accompanied by suspicion. Finally, workers in the southeastern United States are more likely to live away from their families while doing farm and nursery work than migrant worker populations in other areas of the United States.<sup>3,4</sup>

The few available studies on HIV transmission and prevention specifically conducted among LMWs highlight the role played by risk factors such as inadequate or incorrect HIV transmission knowledge, limited access to HIV risk reduction information, unprotected sexual practices, alcohol and other drug use, cultural and gender roles, and immediate survival problems (ie, housing and employment).<sup>5-9</sup> While these studies have made a critical contribution to advance our understanding of the Latino migrant population in the United States and highlight numerous potential differences between this and other populations, their HIV prevention interventions have demonstrated only limited effectiveness<sup>10-14</sup> and documented a critical need for tailoring effective HIV prevention interventions for the Latino migrant population. These adaptations, however, cannot be limited to the cultural translation of existing interventions to be responsive to the cultural uniqueness of Latino migrant populations. The development of new interventions to address HIV prevention in Latino migrant communities needs to take into account their specific circumstances as well as their traditional mistrust of conventional research, which they view as paternalistic and irrelevant to their needs. Consequently, cul-

turally adapted interventions must prompt community engagement and participation at every phase of the program if they do not want to remain culturally blind. It is now widely accepted that conventional, *single-shot* interventions are likely to fail to adequately help LMWs to adopt and maintain HIV risk reduction behaviors in a constantly shifting personal and social environment.<sup>9,15,16</sup> As a result, it seems critical to provide the LMW community with the capacity and infrastructure to prolong community-based HIV prevention activities over time. Latino migrant workers are most likely to benefit from HIV prevention efforts when these efforts are supported at the community level and sustained over time and other needs in the community are also addressed.<sup>17,18</sup>

Community-based participatory research (CBPR) has emerged as a research paradigm that addresses the limitations of conventional research models and offers a “collaborative approach to research that equitably involves all partners in the research process and recognizes the unique strengths that each brings. The ultimate goal is to promote social change to improve community health and reduce health disparities.”<sup>19(p6)</sup> Advantages of CBPR include that it is a participatory and cooperative approach, requires equitable power and mutual ownership, is framed in a co-learning experience, and seeks the balance between research and action. Furthermore, it is an empowering process that involves capacity building among all partners involved. Being a collaborative approach, it is understood that the researcher and community members should work as partners during the entire research process and that trust and mutual respect are aspects that must be present all the time and should guide the relationship among researchers, community members, and all the partners involved in the process.<sup>19</sup>

Although the call for more CBPR-oriented research has increased significantly over the last 15 years, the difficulties in applying such approach to health promotion and disease

prevention are significant and constitute a great challenge to researchers and community members. In this article, we describe (a) Project Salud, a growing CBPR partnership between the Latino migrant community in South Florida and researchers at the Nova Southeastern University and the Florida International University, and (b) a community health worker (CHW) training program—the Latino Migrant Worker HIV Prevention Program (LMW-HIVP)—conducted under Project Salud.

## METHODS

Project Salud—officially titled “HIV Risk Reduction Among High Risk Latino Migrant Workers in South Florida”—was a 4-year major study funded by the National Institute on Minority Health and Health Disparities as part of C-Salud, a P20 Exploratory Center of Excellence at the Florida International University. The main objective of Project Salud was to assess the differential effectiveness of an Adapted Stage-Enhanced Motivational Interviewing (A-SEMI) compared with a Health Promotion Comparison condition for producing long-term reductions in HIV risk and increased health behaviors among LMWs. The design of the A-SEMI intervention is considered to be an enhancement over existing cognitive behavioral risk reduction approaches because A-SEMI integrates key contextual components from effective HIV prevention interventions (ie, peer counseling) linked to maintenance of risk reduction effects.

Project Salud was originally conceived as a CBPR project with the goal of engaging the LMW community in Homestead in the implementation of an HIV prevention intervention. By framing Project Salud within the CBPR approach, this study responded to the National Institutes of Health priority on establishing equitable partnerships between community members and researchers with the final goal of increasing community participation in the research process, improving

community health, and reducing HIV-related health disparities.

A network-based sample of 278 LMWs was recruited from November 2008 to December 2010 from migrant communities in the Homestead area in Miami-Dade County, Florida. Homestead is part of a predominantly rural area in the south of Miami-Dade County, Florida. Official census data indicate that most of the population in Homestead (51.8%) is Hispanic/Latino, more than one-third (36%) is foreign-born, and a majority (57.3%) speaks a language other than English at home.<sup>20</sup> Agriculture and nursery constitute an important business in the Homestead area, allowing for access to seasonal farm work. Homestead’s LMW population is composed primarily of recently arrived, young, single, or married men who are in the United States alone. They live in small, crowded apartments with family or friends. Most are Mexican and Central American arriving in this area with little or no English language skills and very limited resources.

After screening for eligibility, participants were administered a structured baseline questionnaire using A-CASI that included basic sociodemographic information, alcohol and other drug use history, sexual behaviors, acculturation, and behavioral intentionality. An Oral Health questionnaire was also administered at the 9-month follow-up. This study was approved by the institutional review board of the Florida International University.

## Barriers to CBPR

Although building trust to involve community members can be a challenge to any CBPR project,<sup>21-23</sup> this issue became extremely relevant within the Latino migrant community in South Florida because of the legal status of members of this community. Many community members, including community leaders, were undocumented and extremely hesitant to participate in a process that they did not trust or understand. Consequently, a considerable amount of effort went into the process

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of developing a relationship of trust with the community. As this relationship developed, it became clear that the remaining reticence on the part of the community emanated from a deep lack of understanding of the research process, in general, and CBPR, in particular. For our partnership with the Latino migrant community to be a successful one, we understood that this knowledge gap had to be addressed. In commenting on their own experience developing a partnership in the community, Andrews and colleagues<sup>24</sup> pointed out how participants in their study who had formal training in CBPR (ie, coursework, seminars, mentored experiences) had a better appreciation for the CBPR principles and were more likely to sustain partnerships over time. Since none of our partners in the Latino migrant community had any exposure to CBPR, we decided to provide them with that opportunity by creating a training program modeled after existing CHW initiatives within a CBPR framework.<sup>19,25-27</sup>

### **The Latino Migrant Worker HIV Prevention Program**

At the early stages of Project Salud, we planned to address the issue of reinforcing trust in the community while creating community capacity as a key building block in the development of our partnership with the Latino migrant community. We initiated a dialogue with key community partners and community members with the goal of identifying what type of knowledge and skills would be necessary to address the issue of HIV prevention among LMWs. The ultimate goal of this dialogue was to juxtapose the views of both the community and the researchers. On the basis of this exchange of ideas and using other researchers' experiences as a learning framework,<sup>19,25-27</sup> we have created the LMW-HIVP, which is a CBPR-based CHW education program designed to build the knowledge and skills needed at the community level to develop and sustain an effective CBPR partnership to support HIV/AIDS research and prevention in the Latino migrant community.

### **LMW-HIVP objectives**

The LMW-HIVP had 3 main objectives. The first objective was to develop the LMW-HIVP training curriculum and create a training manual and Web site based on it. The second objective was to implement the training curriculum to educate community members as CHWs and incorporate them into Project Salud's HIV prevention efforts. The training curriculum included various fundamental aspects of HIV research and prevention including community outreach and education, data collection, and findings dissemination. The third and final objective was to provide the community with a permanent research facility.

### **Creating the curriculum**

Our first priority was to create a training curriculum that would provide the Latino migrant community with the knowledge and skills to address the issue of HIV research and prevention in their community from a CBPR standpoint. Qualitative methods were used to gain an understanding of the sociocultural values, beliefs, and practices in the area of HIV/AIDS of LMWs working and residing in Homestead. Ethnographic methods used during the curriculum development phase included participant observations, focus groups, and one-on-one, in-depth, semistructured interviews. Project Salud staff spent 14 months in the field attending numerous meetings and community events during which the curriculum was developed.

The curriculum includes 6 units: CBPR Principles, Research Ethics, HIV/AIDS and its impact on the Latino community in the United States, Oral Health, Quantitative Methodology, and Qualitative Methodology. Each unit contains learning objectives, in-depth content information about the topic(s) being presented, examples and interactive exercises that are designed to trigger discussion and to help better understand the concepts being presented, and suggested references and resources. The curriculum was built upon a combination of approaches to teaching and learning and customized to the specific needs

of the community. It was also developed to build on and reflect existing community strengths and assets.\*

### **Implementation of training curriculum**

Before implementing the training curriculum, we hired 2 members from the community to be trained on the training curriculum, assist with the development of the training manual, and support training efforts at the community level.

An empowerment model of education was used for the delivery of the training program. This model, based on the works of Paulo Freire,<sup>28</sup> uses a learning cycle of listening-dialogue-action. The *listening* phase involves systematic listening of community concerns. The *dialogue* phase involves a problem-posing method to enable participants in the analysis of their problems including underlying causes. Finally, during the *action* phase, the facilitator uses structured dialogue within a participatory interactive model for education to help participants identify and reflect on the actions needed to address identified problems individually and socially within the community.<sup>29-31</sup>

The implementation of the training curriculum consisted of a workshop that included seven 1-day training sessions. The entire workshop took place over the course of 2 weeks, and training participants received \$442 at the end of session 7. The first 6 sessions of the training workshop were devoted to each of the 6 units on the curriculum, whereas session 7 was a wrap-up session. Although community participants were welcome to offer their feedback throughout the entire 7-day workshop, we conducted a formal evaluation at the end of session 7. We used participants' comments and the formal evaluation to update and improve the training manual so that each new cohort of community participants would ben-

efit from these improvements. Forty-six community members—26 women and 20 men—were trained in cohorts of 4 to 6 participants.

The success of a CHW program depends in part on recruiting and training individuals with broad social networks who have the time and desire to pass on their knowledge and skills to other members of the community. Our CHW program presented additional challenges since HIV and related risk behaviors—particularly, sex behaviors—are not typically discussed in the Latino culture.<sup>32</sup> We selected training participants on the basis of the following eligibility criteria: (1) Latino migrant worker; (2) literate; (3) aged 18 and older; (4) open-minded about discussing HIV and related risk behaviors; and (5) living and residing in the Homestead area for, at least, 4 months of the year.

Project Salud staff viewed retention in the LMW-HIVP as not merely completion of the program but as active participation in all parts of the program. Therefore, the program addressed issues of access on multiple levels including (1) a relevant and accessible curriculum; (2) teaching methods that fit with cultural norms; (3) making transportation and childcare available to training participants; and (4) providing meals, snacks, and beverages at different points during the training sessions.

### **Creation of a permanent research facility**

The third objective of the LMW-HIVP was to provide the community with a permanent research facility that would support the community efforts to promote health and prevent HIV infection over time. In a combined effort between Project Salud and one of its main community partners, the Farmworker Association of Florida (FWAF), we created a permanent research environment through the creation of a research facility at the offices of the FWAF in Homestead. This office has been furnished with new computer equipment, printers, software, office supplies, and, in general, everything necessary for the day-to-day

\*Extensive information on the curriculum—in both its Spanish and English versions—is available at the following Web site: <https://sites.google.com/a/fiu.edu/hispanic-migrant-workers-training-curriculum/>

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operation of a research facility, including technical assistance by Project Salud staff. This new research facility currently houses the ongoing LMW-HIVP training workshops and serves as a hub for the array of activities being conducted under Project Salud. For instance, as we are preparing a new grant proposal to extend and expand Project Salud's HIV prevention efforts in the community, we are using this research facility for CAB meetings, focus groups, and other activities.

## DISCUSSION

Challenges to conducting CBPR are well documented and may discourage researchers and community members from engaging in this type of research.<sup>33-35</sup> Project Salud engaged the Latino migrant community in South Florida with the goal of establishing a partnership based on CBPR principles to address HIV prevention. One of the most critical challenges we faced was a lack of understanding on the part of the community regarding research, in general, and CBPR, in particular. We realized that it was not viable to establish and sustain a true collaborative, equitable research partnership with the Latino migrant community unless we could generate co-learning and capacity-building opportunities that could provide them with the necessary knowledge and skills as well as maintain HIV prevention efforts in the community.

In response to this assessment, Project Salud has been genuinely invested in building community capacity by developing and implementing a CHW education training program—LMW-HIVP—and creating a permanent research environment in the community. The training program gave community members an opportunity to acquire knowledge and skills on how to conduct research that were very scarce in the community. The training program also increased community awareness and understanding of the effect of HIV epidemic on Latinos in the United States and the importance of community efforts to prevent HIV infection in the community. Finally,

as they finished their training, CHWs were integrated into Project Salud's HIV research and prevention activities such as recruitment of study participants, delivery of survey and intervention instruments, and dissemination of information. Following a long-standing tradition of training community members in underserved communities and employing them as CHWs,<sup>36-38</sup> LMW-HIVP trainees play a key role in disseminating the knowledge and skills they received as part of their training to promote health, prevent HIV infection, and reduce health disparities in the Latino migrant community. As members of the community, training participants possess an intimate understanding of community social networks, communicate in a similar language, and recognize and incorporate cultural elements to promote health and health outcomes within their community.

However, research and prevention strategies require not only knowledge and skills but also the material means to apply them. Project Salud, in partnership with the FWAFF, has created a permanent research facility in the association's offices in Homestead that houses many of the activities related to this project and plans for future ones.

## CONCLUSIONS

Although a summative evaluation of the LMW-HIVP is in the process of being conducted, we have received feedback from the community that supports the implementation of a CBPR approach to HIV prevention in the community as well as the utilization of CHWs as a key component of this approach. Community members participating in the training have demonstrated a substantial growth in their competency, knowledge, and skills required to optimizing their contribution to HIV prevention in their community. We have also observed an increase in community awareness and in the number of members of the LMW community who have approached Project Salud staff or any of our community partners asking about

testing, resources, and referrals as a result of coming in contact with a CHW. Finally, we have been approached by different migrant worker organizations and clinics about the possibility of partnering in different HIV prevention projects, which will sustain the ongoing efforts.

As evidence of the added benefit of their contribution to health promotion and disease prevention continues to mount, CHWs can and should become key players toward the implementation of any CBPR-based project in the Latino migrant population of South Florida.

## [AQ4] REFERENCES

1. Center for Disease Control and Prevention. *HIV Among Hispanic/Latino*. Atlanta, GA: Center for Disease Control and Prevention; 2010. <http://www.cdc.gov/hiv/hispanics/index.htm>.
2. Center for Disease Control and Prevention. *HIV Behavioral Interventions for Hispanics/Latinos in the US: A Meta-Analytic Review*. Atlanta, GA: Center for Disease Control and Prevention. [http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst\\_latinconsult.pdf](http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst_latinconsult.pdf).
3. Soskolne V, Shtarkshall RA. Migration and HIV prevention programmes: linking structural factors, culture, and individual behaviour—an Israeli experience. *Soc Sci Med*. 2002;55(8):1297-1307.
4. Shtarkshall R, Soskolne V. Migrant populations and HIV/AIDS: the development and implementation of programmes: theory, methodology and practice. *UNESCO UNAIDS*: Paris, France/Geneva, Switzerland; 2000.
5. Organista PB, Organista KC, Soloff PR. Exploring AIDS-related knowledge, attitudes, and behaviors of female Mexican migrant workers. *Health Soc Work*. 1998;23(2):96-103.
6. Aranda-Naranjo B, Gaskins S. HIV/AIDS in migrant and seasonal farm workers. *J Assoc Nurses AIDS Care*. 1998;9(5):80-83.
7. Fernandez MI, Collazo JB, Hernandez N, et al. Predictors of HIV risk among Hispanic farm workers in South Florida: women are at higher risk than men. *AIDS Behav*. 2004;8(2):165-174.
8. Hernandez MT, Lemp GF, Castañeda X, et al. HIV/AIDS among Mexican migrants and recent immigrants in California and Mexico. *J Acquir Immune Defic Syndr*. 2004;37(4):s203.
9. Sanchez MA, Lemp GF, Rodriguez-Magis C, Bravo-Garcia W, Carter S, Ruiz JD. The epidemiology of HIV among Mexican migrants and recent immigrants in California and Mexico. *J Acquir Immune Defic Syndr*. 2004;37(4):s204-s214.
10. Mishra SI, Conner RF. Evaluation of an HIV prevention program among Latino farmworkers. In Mishra SI, Conner RF, Magaña JR, eds. *AIDS Crossing Borders: The Spread Among Migrant Latino*. Boulder, CO: Westview Press; 1996.
11. Weatherby NL, McCoy HV, Bletzer KV, et al. Sexual activity and HIV among drug users: migrant workers and their sexual partners in southern Florida. *Fla J Public Health*. 1995;7(1):22-26.
12. McCoy HV, McCoy CB, Lai S. Effectiveness of HIV interventions among women drug users. *Women Health*. 1998;27(1/2):49-69.
13. McCoy HV, McCoy CB, Lai S, et al. Behavior changes among crack-using rural and urban women. *Subst Use Misuse*. 1999;34(4/5):667-684.
14. Weatherby NL, McCoy HV, Bletzer KV, et al. Immigration and HIV among migrant workers in rural southern Florida. *J Drug Issues*. 1997;27(1):155-172.
15. Rao P, Hancy K, Velez M, et al. HIV/AIDS and farmworkers in the US. *Farmworker Justice*. 2008.
16. Vega WA, Rodriguez MA, Gruskin E. Health disparities in the Latino population. *Epidemiol Rev*. 2009;31:99-112.
17. Parker RG, Easton D, Klein CH. Structural barriers and facilitators in HIV prevention: a review of international research. *AIDS*. 2000;14(1):S22-S32.
18. Arcury TA, Austin CK, Quandt SA, et al. Enhancing community participation in intervention research: farmworkers and agricultural chemicals in North Carolina. *Health Educ Behav*. 1999;26(4):563-578.
19. Minkler M, Wallerstein N, eds. *Community-Based Participatory Research for Health: From Process to Outcomes*. 2nd ed. San Francisco, CA: Jossey-Bass; 2008.
20. US Census Bureau. State and county quick facts, Homestead, Florida. Data derived from Population Estimates. <http://quickfacts.census.gov/qfd/states/12/1232275.html>. Published 2000.
21. Freyder PJ, O'Toole TP. Principle 2: the relationship between partners is characterized by mutual trust, respect, genuineness and commitment. *Partnersh Perspect*. 2000;1(2):19-25.
22. Becker AB, Israel BA, Allen AJ. Strategies and techniques for effective group process in CBPR partnerships. In Israel BA, Eng E, Schulz AJ, Parker EA, eds. *Methods in Community-Based Participatory Research for Health*. San Francisco, CA: Jossey-Bass; 2005.
23. Rhodes SD, Hergenrather KC, Montañón J, et al. Using community-based participatory research to develop an intervention to reduce HIV and STD infections among Latino men. *AIDS Educ Prev*. 2006;18(5):375-389.

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24. Andrews OJ, Newman DS, Meadows O, et al. Partnership readiness for community-based participatory research. *Health Educ Res.* 2010. PMID: 20837654.
25. Eisinger A, Senturia KD. Doing community-driven research: a description of Seattle partners for healthy communities. *J Urban Health.* 2001;78(3):519-534.
26. Calleson DC, Seifer SD, Maurana C. Forces affecting community involvement of AHCs: perspectives of institutional and faculty leaders. *Acad Med.* 2002;77(1):72-81.
27. Examining Community-Institutional Partnerships for Prevention Research Group. Building and sustaining community-institutional partnerships for prevention research: findings from a national collaborative. *J Urban Health.* 2006;83(6):989-1003.
28. Freire P. *Education for Critical Consciousness.* New York, NY: Seabury Press; 1973.
29. Beeker C, Guenther-Grey C, Raj A. Community empowerment paradigm drift and the primary prevention of HIV/AIDS. *Soc Sci Med.* 1998;47:831-842.
30. Wallerstein N. Powerlessness, empowerment, and health: implications for health promotion programs. *Am J Health Promot.* 1992;6:197-205.
31. Wallerstein N, Baker R. Labor education programs in health and safety. *Occup Med State Art Rev.* 1994;9:305-320.
32. De la Vega E. Considerations for reaching the Latino population with sexuality and AIDS/AIDS information and education. *SIECUS Rep.* 1990;18:1-8.
33. Freeman ER, Brugge D, Bennet-Bradley WM, Levy JJ, Carrasco ER. Challenges of conducting community-based participatory research in Boston's neighborhoods to reduce disparities in asthma. *J Urban Health.* 2006;83(6):1013-1021.
34. Strickland CJ. Challenges in community-based participatory research implementation: experiences in cancer prevention with pacific northwest American Indian tribes. *Cancer Control.* 2006;13:230-236.
35. Israel BA, Eng E, Schultz AJ, Parker EA, eds. *Methods in Community-Based Participatory Research for Health.* San Francisco, CA: Jossey-Bass; 2005.
36. Parker EA, Schulz EA, Israel BA, et al. Worker partnership: community-based lay health advisor intervention in an urban area. *Health Educ Behav.* 1998;25(1):24-45.
37. Jackson EJ, Parks CP. Recruitment and training issues from selected lay health advisor programs among African Americans: a 20-year perspective. *Health Educ Behav.* 1997;24:418-431.
38. Rhodes SD, Foley KL, Someta CS, et al. Lay health advisor interventions among Hispanics/Latinos: a qualitative systematic review. *Am J Prev Med.* 2007;33(5):418-427.

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## Project Salud: Using community-based participatory research to culturally adapt an HIV prevention intervention in the Latino migrant worker community

Jesús Sánchez, PhD<sup>1</sup>, Claudia A Serna, DDS<sup>2</sup>, and Mario de La Rosa, PhD<sup>3</sup>

<sup>1</sup>Department of Sociobehavioral and Administrative Pharmacy, College of Pharmacy, Nova Southeastern University, Fort Lauderdale, Florida

<sup>2</sup>Department of Health Promotion and Disease Prevention, Florida International University, Miami, Florida

<sup>3</sup>Center for Research on US Latinos, HIV/AIDS and Drug Abuse, Robert Stempel College of Public Health and Social Work, Florida International University, Miami, Florida

### Abstract

Despite the unique and challenging circumstances confronting Latino migrant worker communities in the U.S., debate still exists as to the need to culturally adapt evidence-based interventions for dissemination with this population. Project Salud adopted a community-based participatory research model and utilized focus group methodology with 83 Latino migrant workers to explore the relevance of culturally adapting an evidence-based HIV prevention intervention to be disseminated within this population. Findings from this study indicate that, despite early reservations, Latino migrant workers wanted to participate in the cultural adaptation that would result in an intervention that was culturally relevant, respectful, responsive to their life experiences, and aligned with their needs. This study contributes to the cultural adaptation/fidelity debate by highlighting the necessity of exploring ways to develop culturally adapted interventions characterized by high cultural relevance without sacrificing high fidelity to the core components that have established efficacy for evidence-based HIV prevention interventions.

### Keywords

Latino; migrants; HIV/AIDS prevention; cultural adaptation; CBPR

### INTRODUCTION

Understanding and addressing the causes of HIV related health disparities among Latinos in the U.S. is increasingly relevant as the magnitude of immigrant and migrant populations from Latin America and the Caribbean continue to grow (1). The Latino community living in the United States has been disproportionately impacted by the HIV/AIDS epidemic (2), while the development, implementation, and evaluation of HIV prevention interventions designed to reduce the risk of infection among Latinos lags behind prevention efforts targeting other communities (3). This public health gap is particularly apparent when considering the sparse attention received by Latino migrant workers in the United States despite their high risk for HIV infection. Research indicates that most Latino migrant

**Correspondence:** Professor Jesús Sánchez, Ph.D. Associate Professor, Department of Sociobehavioral and Administrative Pharmacy, College of Pharmacy, Nova Southeastern University, 3200 South University Drive, Fort Lauderdale, FL 33328-2018. js2769@nova.edu.

workers (LMWs) become infected while in the U.S., underlining the importance of enhancing both HIV prevention and treatment efforts (4).

Research has specifically linked migration to increased HIV incidence and vulnerability in a variety of contexts and places. A greater risk for poor health and limited access to health services, low socioeconomic status, low levels of formal education, and marginalization are among the main reasons why LMWs are particularly vulnerable to HIV infection (5–6). The few available studies on HIV transmission and prevention specifically conducted among Latino migrant workers highlight the role played by many complex and interrelated factors. These include social norms, health-related beliefs, attitudes and behaviors related to sex and drug use, and social and environmental factors such as housing and employment (7–11). LMWs bring with them an assortment of beliefs, attitudes, and practices that vary from country to country of origin and that—when put into practice in their new communities—often result in a sense of cultural shock, stress, and alienation that may impact health-risk behaviors, in general, and HIV related risk behaviors in particular. The development of effective HIV prevention interventions for the Latino migrant worker community requires that we address the cultural and societal issues that put LMWs at risk as well as focus on the cultural strengths that might assist members of this community to stay safe.

While the existing studies have made a critical contribution to advance our understanding of the Latino migrant worker population in the US and highlight numerous potential differences between this and other populations, their HIV prevention interventions have demonstrated only limited effectiveness (12–14) and documented a critical need for tailoring effective HIV prevention interventions for the Latino migrant worker population. These adaptations, however, cannot be limited to the cultural translation of existing interventions based on cultural generalizations or preconceptions associated with Latinos (15–16). A pervasive limitation of many of these cultural translations involves the use of the umbrella category “Latino” (or “Hispanic”) which presents an obfuscated description that pretends to capture the characteristics of a large group of national and ethnic populations. Another important limitation is the imposition of the term “Latino” on different subgroups with different characteristics, backgrounds, and migration experiences without asking members of these groups for their opinion. These limitations contribute to the traditional mistrust among LMWs of conventional research which they view as paternalistic, misguided, and irrelevant to their needs. As a result, conventional prevention strategies are likely to fail to adequately help Latino migrant workers to adopt and maintain HIV risk reduction behaviors in a constantly shifting personal and social environment (17–19). Culturally adapted interventions must prompt community engagement and participation at every phase of the program if they do not want to remain culturally blind. Latino migrant workers are most likely to benefit from HIV prevention efforts when these efforts are supported at the community level, sustained over time, and the overall needs of the community are addressed (20–22).

Community based participatory research (CBPR) has emerged as a research paradigm that addresses the limitations of conventional research models and offers a “collaborative approach to research that equitably involves all partners in the research process and recognizes the unique strengths that each brings. The ultimate goal is to promote social change to improve community health and reduce health disparities” (23). Advantages of CBPR include that it is a participatory and cooperative approach, requires equitable power and mutual ownership, is framed in a co-learning experience, and seeks the balance between research and action. Furthermore, it is an empowering process that involves capacity building among all partners involved.

In this paper, we describe (a) Project Salud, a growing CBPR partnership between the Latino migrant worker community in South Florida and researchers at Nova Southeastern University and Florida International University; and (b) the value of using focus groups with the Latino migrant community in South Florida to culturally adapt an evidence-based HIV prevention intervention before implementation in the community.

## METHODS

Project Salud--officially entitled "HIV Risk Reduction among High Risk Latino Migrant Workers in South Florida"--was a 4-year major study funded by the National Institute on Minority Health and Health Disparities (NIMHD) as part of C-Salud, a P20 Exploratory Center of Excellence at Florida International University. The main objective of Project Salud was to assess the differential effectiveness of an Adapted Stage-Enhanced Motivational Interviewing (A-SEMI) compared to a Health Promotion Comparison (HPC) condition for producing long-term reductions in HIV risk and increased health behaviors among LMWs. The design of the A-SEMI intervention is considered to be an enhancement over existing cognitive behavioral risk reduction approaches because A-SEMI integrates key contextual components from effective HIV prevention interventions (i.e., peer counseling) linked to maintenance of risk reduction effects. As described in this paper, the A-SEMI intervention was culturally adapted in collaboration with the LMW community.

Project Salud was conceived as a CBPR project with the goal of engaging the Latino migrant worker community in Homestead in the implementation of an HIV prevention intervention. By framing Project Salud within the CBPR approach, this study responded to the NIH priority on establishing equitable partnerships between community members and researchers with the final goal of increasing community participation in the research process, improving community health, and reducing HIV-related health disparities.

### Design

At the early stages of Project Salud, we set off a plan to address the issue of cultural adaptation while reinforcing trust in the community and creating community capacity as a key building block in the development of our partnership with the Latino migrant worker community. We initiated a dialogue with key community partners and community members with the goal of identifying what type of strategies would be adequate to address the issue of HIV prevention among Latino migrant workers. The ultimate goal of this dialogue was to juxtapose the views of both the community and the researchers. Based on this exchange of ideas and using other researchers' experiences as a learning framework (24–26), we decided that focus group methodology was the appropriate approach. Researchers who work with migrant populations have reported on the complexities of working with these populations and how a unique sensitivity is required to understand how particular phenomena are experienced and expressed (27). Focus groups provide several advantages over the conventional methods in instrument development. First, focus groups are useful for developing insights into the perceptions and points of view of persons who have some common characteristics related to the research topic and for appreciating the variation in people's experiences (28). The resulting intervention is more likely to be grounded in the experiences of the population under study. Generating knowledge from focus groups can provide reasonable assurance that the instrument is culturally anchored. Second, focus groups inform researchers about the language and terminology that particular groups of people use regarding the construct under study (28). By preserving the terminology from the focus group, items included in the intervention may reflect the language of the population of interest. Third, the focus group's social nature often stimulates stories and insights that would be missed otherwise (29).

Focus groups were conducted at the early stages of Project Salud when both the project and the researchers involved in it were still unknown to many community members. We undertook a series of preparatory activities prior to conducting the focus groups to better inform the Latino migrant worker community in Homestead about who we were, the goals of the project, and our desire to establish a true partnership with the community. As part of these preparatory steps, we conducted several town hall meetings at venues such as churches, street markets, a community center, and the offices of the Farmworker Association of Florida in Homestead. We expanded our partnership with professionals in health and social services, advocates, religious leaders, AIDS educators and, more importantly, nursery and agricultural workers. As our partnership grew larger and stronger, Project Salud started being recognized in the community.

Another positive outcome of our increasing presence and recognition in the community resulted in the implementation of strategies that increased recruitment rates and representativeness. Community members' concerns about becoming involved in a focus group began to dissipate during town hall meetings and the different activities conducted at the early stages of the project. The support of community partners was crucial at a time when the current anti-immigration climate and policies in the U.S. have negatively impacted the lives of migrant workers. We addressed this issue by validating such concerns and extensively reviewing the standards of confidentiality and the rights of each participant (i.e., right to withdraw from the study at any time, right to refuse to answer questions). We also adopted community members' suggestions regarding the locations where we could meet and conduct the focus groups. The suggested sites--unlike some of the locations we had originally preselected--were considered by the community as safer and less likely to be raided by immigration authorities.

To be selected for the focus groups, participants had to (a) be 18 years old or older; (b) be a first generation immigrant; (c) be a member of the Latino migrant worker community in the Homestead area; and (d) express an interest to participate in the focus group interview.

A total of eight focus groups were conducted with a range of 6 to 12 participants per focus group. A maximum number of 12 participants per group was established in order to better facilitate group discussions. Each focus group interview lasted between 120 and 180 minutes and was held in the evening and/or weekend. All focus groups started with a dinner, an overview of Project Salud, completion of a consent form, and brief demographic questionnaire. Each participant received a \$40 stipend for their participation. Participants were required by IRB policy to complete a form documenting their receipt of the participant payment; however, no personal identifiers were requested.

Eighty-three members of the Latino migrant worker community participated in the focus groups. Although it was planned in the original research protocol to organize focus groups according to a set of criteria (i.e., gender, nationality, age), the design was modified in response to the contextual challenges associated with recruitment. In particular, participants were encouraged to join whichever focus group was possible for them to attend.

Focus groups were consistent in their delivery and draw upon the same protocol guidelines. Each session was facilitated by a project member with experience in focus group facilitation while another project member was present at each session as a note-taker. Focus groups were conducted in Spanish and the discussions were audio recorded and then transcribed for purposes of data analysis. Prior to conducting the focus groups, we hired two members from the LMW community to be trained on the project, assist with the development of the focus group protocol, and support focus group sessions.

Project Salud members introduced themselves and provided a five to ten minute overview of the project. Project members made this presentation highly interactive as a means to warm up the focus group participants. For instance, they included a trivia or guessing game as part of the presentation. Group members introduced themselves and were invited to briefly express an opinion on the impact of the HIV/AIDS epidemic on their community. This initial discussion provided a context for the group from which to proceed. Participants were told that focus groups were being held in order to learn from the Latino migrant worker community about their knowledge, behaviors, and attitudes towards the HIV/AIDS epidemic. They were also inquired about their interest in participating in a study that would utilize the information learned from the focus groups to determine how the different intervention components should be adapted and implemented in order to increase community members' motivation to participate in this initiative and establish a sustainable strategy for implementing the adapted intervention in the community.

Project Salud members explained that the research team sought to offer an existing evidence-based HIV prevention intervention to the LMW community that had proven beneficial to other communities. Therefore, the focus group sessions were a key step toward clarifying how relevant LMWs find the specific core components (i.e., skills) covered in the original intervention, exploring if the intervention was responsive to their life experiences and cultural background, and making the necessary cultural adaptations. The ensuing discussion followed the protocol guidelines tailored to explore and discuss the core components of the evidence-based intervention.

## RESULTS

Using focus groups proved to be a challenging but successful experience that provided many insights into culturally shaping the A-SEMI intervention. In this section, a few examples are offered on the type of knowledge that was gathered through the implementation of the focus groups as well as how that information was utilized towards the cultural adaptation of the intervention.

Talking about HIV-related behaviors, attitudes, and beliefs in a group setting can be extremely difficult for Latino men and women who view topics such as sexual behaviors as very personal. Because of this, we found that some participants would talk about these issues as if they were happening to a friend or relative. On the other hand, we also concluded that—although less private—the use of oral and group-centered strategies were more reflective of the dominant learning styles, orientations, values and educational levels of participants. As a result, although an interventionist would typically encourage participants to talk about their own experiences and opinions, we agreed that when working with the LMW community, we needed to be aware that—in some instances—one strategy to cope with the discomfort of talking about personal issues is to frame it as the experience of someone else.

The focus groups also revealed the need for a more dynamic understanding of the cultural milieu that characterizes Latino migrant worker communities. An example of how sweeping assertions about Latino culture fail to capture the shifting cultural dynamics of this community is reflected in the impact of changing gender roles on sexual relations. Traditional gender roles are often associated with Latino culture. Machismo and marianismo are presented as playing a crucial role in shaping sexual communication and relations between Latino men and women (30). Because of the apparent power imbalance that characterizes these relationships, some scholars suggest that theories that emphasize sexual division of labor and power may be an appropriate intervention framework. However, our focus groups revealed that—although often times this power imbalance may have

characterized participants' sexual relations in their countries of origin—as LMWs spend more time away from their countries of origin, they begin to reconsider those gender role expectations. This trend was particularly salient among the women who participated in the focus groups. Having to endure the same harsh working and housing conditions as their male counterparts, Latina migrant workers question the traditional idea of the submissive Latina who centers her life around her family and is generally obedient to the men in her life. As a result, sexual culture in the LMW community can be characterized as the coexistence of traditional and modern values. In light of this finding, it was crucial to culturally adapt the A-SEMI intervention to reflect the coexisting cultural expectations and rules of sexual interaction among LMWs.

Another salient value associated with traditional Latino culture is familismo, which places the multigenerational extended family at the core of the culture. Familismo promotes closeness and interconnectedness among extended family members and provides a sense of responsibility to care for all members of the family (30). Most of the participants in the focus groups had few or no relatives living with them in the U.S. Many of the male participants indicated that they came to the U.S. by themselves and would not risk bringing their families over because of the risks associated with getting smuggled into the U.S. Other participants indicated that their spouses or significant others had been deported back to their countries of origin and, in most cases, were trying to cross the border again. As a result, the positive impact provided by familismo in terms of social support, knowledge, and material resources is lacking in the LMW community. In its absence, participants stressed the importance of developing a sense of community. Participants highlighted the importance of facilitating learning experiences by promoting a sense of community among those who would participate in the intervention. Specifically, rather than limiting group interventions to didactic sessions focused exclusively on disseminating knowledge and teaching skills, participants affirmed that interventions should also promote group cohesion and supportive relationships among intervention participants. Many participants in the focus groups commented on how valuable the focus group session was to them, as well as their desire to extend the same type of dynamic into the intervention. Participants expressed that the intervention groups should constitute a resource for empowering participants. Consequently, the A-SEMI intervention was culturally adapted to enhance empowerment as a multilayered process beyond the cultural domains directly related to HIV prevention (i.e., sexual relations).

### **Conducting project Salud**

A network-based sample of 278 Latino migrant workers was recruited from November 2008 to December 2010 from migrant communities in the Homestead area in Miami-Dade County, Florida. Homestead is part of a predominantly rural area in the South of Miami-Dade County, Florida. Official census data indicate that most of the population in Homestead (51.8%) is Hispanic/Latino, more than one-third (36%) is foreign born, and a majority (57.3%) speaks a language other than English at home (31). Agriculture and nursery constitute an important business in the Homestead area allowing for access to seasonal farm work. Homestead's Latino migrant worker population is composed primarily of recently arrived, young, single or married men that are in the United States alone. They live in small crowded apartments with family or friends. Most are Mexican and Central American arriving in this area with little or no English language skills and very limited resources.

After screening for eligibility, participants were administered a structured baseline questionnaire using A-CASI that included basic socio-demographic information, alcohol and other drug use history, sexual behaviors, acculturation, and behavioral intentionality. Study participants were then randomly assigned to the A-SEMI and HPC intervention groups. Two

follow-up assessments were administered at 3 and 9 months after the baseline questionnaire. This study was approved by the IRB of Florida International University. Data analysis is being conducted at the present time to assess the differential effectiveness of the A-SEMI compared to the HPC condition for producing short and long-term reductions in HIV risk and increased health behaviors among LMWs.

## DISCUSSION

This study contributes to the existing literature in relevant ways. For instance, the narratives shared by members of the Latino migrant worker community provide additional evidence of their resistance to participate in conventional research which they perceive as paternalistic, abusive, and irrelevant to their needs. Overcoming their traditional mistrust and engaging the LMW community was paramount for the success of Project Salud.

Culturally adapted interventions must prompt community engagement and participation at every phase of the program if they do not want to remain culturally blind. Findings from this study underscore the strong desire of LMWs in the Homestead community to participate in HIV prevention interventions and highlight the importance for interventions to be culturally relevant, respectful, and responsive to their life experiences. In particular, it is important to adapt interventions according to relevant Latino cultural values and experiences specific to the Latino group under consideration instead of just relying on sweeping generalizations about Latino culture. Participants in this study emphasized that interventionists needed to communicate to community members a genuine understanding of the contextual challenges that impact their lives, help them to address barriers to participation, and constantly promote a dialogue aimed at examining the cultural relevance of the intervention. For instance, participants conveyed the importance of promoting a sense of empowerment and community among participants taking part in the intervention and emphasized the important role this could play given that many of the participants were not living with their families. Thus, interventions that rely primarily on dyadic instruction between the interventionist and community member may be of limited appeal to the LMW community. Instead, culturally relevant interventions for LMWs should facilitate a group learning experience that promotes trust, social support, and empowerment.

We also believe that present findings also contribute in a significant way to the cultural adaptation/fidelity debate. While cultural adaptation scholars argue that evidence-based interventions should be culturally adapted before dissemination (32), fidelity advocates consider that the need for cultural adaptation has been overstated (33). Researchers have also expressed that modifying existing interventions may reduce or eliminate the impact of the core components of original interventions (33). While Project Salud recognizes the need to respect the core components of the original intervention that proved to be efficacious, we agree with those who underscore the importance of attending to the cultural values and traditions that target populations consider to be most relevant in their lives without relying on theoretical preconceptions associated with specific ethnic minority populations (34). Focus group participants understood the need to balance the cultural relevance of the intervention with the need for intervention fidelity. As a result, we believe A-SEMI can be considered what some researchers (35) refer to as a hybrid model that bridges the need for rigorous scientific research with the needs for cultural relevance in terms of intervention content and delivery.

## CONCLUSIONS

Statistical analyses are being conducted on the effects of the A-SEMI intervention on HIV prevention in the LMW community. Consequently, we cannot evaluate whether the

culturally adapted components and delivery of the A-SEMI intervention increased efficacy. However, we can attest to the positive impact of engaging the LMW community in a CBPR process in which the beneficiaries of the proposed intervention can identify the values, traditions, and cultural experiences that are most relevant to their lives.

Community members participating in the focus groups that led to the cultural adaptation of the A-SEMI intervention recognized the significance of being invited to help with the design of an HIV prevention intervention. They expressed a sense of being empowered with a voice in the design of a science-based prevention program that also fits the LMW community's traditions, values, and needs. We have also observed an increase in community awareness and in the number of members of the Latino migrant worker community who have approached Project Salud staff or any of our community partners asking about testing, resources, and referrals as a result of coming in contact with Project Salud. As evidence of the added benefit of their contribution to health promotion and disease prevention in their community continues to mount, Latino migrant workers can and should become key players toward the implementation of any CBPR-based project in the Latino migrant population of South Florida.

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## REFERENCES

1. [Accessed 2011 November 14] The Hispanic population: 2010. 2010 Census Briefs. URL: <http://www.census.gov/prod/cen2010/briefs/c2010br-04.pdf>
2. HIV among Hispanic/Latino. Center for Disease Control and Prevention; URL: <http://www.cdc.gov/hiv/hispanics/index.htm> [Accessed 2011 August 22]
3. HIV Behavioral Interventions for Hispanics/Latinos in the US: A Meta-Analytic Review. Center for Disease Control and Prevention; URL: [http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst\\_latinoconsult.pdf](http://www.cdcnpin.org/scripts/HispanicLatino/files/herbst_latinoconsult.pdf) [Accessed 2011 August 22]
4. Deren S, Sheldin M, Decena CU, Mino M. Research challenges to the study of HIV/AIDS among migrant and immigrant Hispanic populations in the United States. *J Urban Health*. 2005; 82(2):iii13–25. [PubMed: 15933327]
5. Soskolne V, Shtarkshall RA. Migration and HIV prevention programmes: Linking structural factors, culture, and individual behaviour—an Israeli experience. *Soc Sci Med*. 2002; 55(8):1297–1307. [PubMed: 12231010]
6. Shtarkshall, R.; Soskolne, V. Migrant populations and HIV/AIDS: The development and implementation of programmes: theory, methodology and practice. UNESCO UNAIDS; 2000.
7. Organista PB, Organista KC, Soloff PR. Exploring AIDS-related knowledge, attitudes, and behaviors of female Mexican migrant workers. *Health Soc Work*. 1998; 23(2):96–103. [PubMed: 9598392]
8. Aranda-Naranjo B, Gaskins S. HIV/AIDS in migrant and seasonal farm workers. *J Assoc Nurses AIDS Care*. 1998; 9(5):80–3. [PubMed: 9742483]
9. Fernandez MI, Collazo JB, Hernandez N, et al. Predictors of HIV risk among Hispanic farm workers in South Florida: women are at higher risk than men. *AIDS Behav*. 2004; 8(2):165–74. [PubMed: 15187478]
10. Hernandez MT, Lemp GF, Castañeda X, et al. HIV/AIDS among Mexican migrants and recent immigrants in California and Mexico. *J Acquir Immune Defic Syndr*. 2004; 37(4):s203–17.

11. Sanchez MA, Lemp GF, Rodriguez-Magis C, Bravo-Garcia W, Carter S, Ruiz JD. The epidemiology of HIV among Mexican Migrants and recent immigrants in California and Mexico. *J Acquir Immune Defic Syndr*. 2004; 37(4):s204–14. [PubMed: 15722863]
12. Mishra, SI.; Conner, RF. Evaluation of an HIV prevention program among Latino farmworkers. In: Mishra, SI.; Conner, RF.; Magaña, JR., editors. *AIDS crossing borders: The spread among migrant Latino*. Westview Press; Colorado: 1996.
13. Weatherby NL, McCoy HV, Bletzer KV, et al. Sexual activity and HIV among drug users: Migrant workers and their sexual partners in southern Florida. *Florida Journal of Public Health*. 1995; 7(1): 22–6.
14. McCoy HV, McCoy CB, Lai S. Effectiveness of HIV interventions among women drug users. *Women Health*. 1998; 27(1–2):49–69. [PubMed: 9640634]
15. Kumpfer KL, Alvarado R, Smith P, Bellamy N. Cultural sensitivity in universal family-based prevention interventions. *Prev Sci*. 2002; 3:241–4. [PubMed: 12387558]
16. Bernal G, Saez-Santiago. Culturally centered psychosocial interventions. *J Comm Psych*. 2006; 34:121–32.
17. McCoy HV, McCoy CB, Lai S, et al. Behavior changes among crack-using rural and urban women. *Subst Use Misuse*. 1999; 34(4–5):667–84. [PubMed: 10210099]
18. Weatherby NL, McCoy HV, Bletzer KV, et al. Immigration and HIV among migrant workers in rural southern Florida. *J Drug Issues*. 1997; 27(1):155–72.
19. Rao, P.; Hancy, K.; Velez, M., et al. *Farmworker Justice*. 2008. HIV/AIDS and farmworkers in the US.
20. Organista KC, Carrillo H, Ayala G. HIV prevention with Mexican migrants. Review, critique and recommendations. *J Acquir Immune Defic Syndr*. 2004; 37(4):S227–39. [PubMed: 15722865]
21. Vega WA, Rodriguez MA, Gruskin E. Health disparities in the Latino population. *Epidemiol Rev*. 2009; 31:99–112. [PubMed: 19713270]
22. Arcury TA, Austin CK, Quandt SA, et al. Enhancing community participation in intervention research: farmworkers and agricultural chemicals in North Carolina. *Health Educ Behav*. 1999; 26(4):563–78. [PubMed: 10435238]
23. Minkler, M.; Wallerstein, N., editors. *Community-based participatory research for health: From process to outcomes*. 2nd Ed. Jossey-Bass; San Francisco, CA: 2008.
24. Rhodes SD, Hergenrath KC, Montañó J, et al. Using community-based participatory research to develop an intervention to reduce HIV and STD infections among Latino men. *AIDS Educ Prev*. 2006; 18(5):375–89. [PubMed: 17067250]
25. Andrews OJ, Newman DS, Meadows O, et al. Partnership readiness for community-based participatory research. *Health Educ Res*. 2010 PMID: 20837654.
26. Eisinger A, Senturia KD. Doing community-driven research: A description of Seattle partners for healthy communities. *J Urban Health*. 2001; 78(3):519–34. [PubMed: 11564854]
27. Hughes D, DuMont K. Using focus groups to facilitate culturally anchored research. *American J Comm Psych*. 1993; 21:775–806.
28. Morgan, DL. *The focus group guidebook*. Sage; Thousand Oaks, CA: 1993.
29. Asbury J. Overview of focus group research. *Qual Health Res*. 1995; 5:414–20.
30. Vanoss Marin B. HIV prevention in the Hispanic community: Sex, culture, and empowerment. *J Transcultural Nursing*. 2003; 14(3):186–92.
31. U.S. Census Bureau. State and county quick facts, Homestead, Florida. Data derived from Population Estimates. Accessed 2011 August 22. URL: <http://quickfacts.census.gov/qfd/states/12/1232275.html>
32. Castro FG, Barrera M, Martinez CR. The cultural adaptation of prevention interventions: Resolving tensions between fidelity and fit. *Prev Sci*. 2004; 5:41–5. [PubMed: 15058911]
33. Elliot DS, Mihalic S. Issues in disseminating and replicating effective prevention programs. *Prev Sci*. 2004; 5:47–53. [PubMed: 15058912]
34. Griner D, Smith TB. Culturally adapted mental health interventions: A meta-analytic review. *Psychother*. 2006; 43:531–48.

35. Castro FG, Hernandez-Aaron E. Integrating cultural values into drug abuse prevention and treatment with racial/ethnic minorities. *J Drug Issues*. 2002; 32:783–810.

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**APÉNDICE 2**

**MANUAL DE ENTRENAMIENTO PARA LOS**

**TRABAJADORES AGRÍCOLAS EN EL SUR DE LA**

**FLORIDA**

# Manual de Entrenamiento para los Trabajadores Agrícolas en el Sur de la Florida



FLORIDA INTERNATIONAL UNIVERSITY

Autores

Jesús Sánchez, Ph.D.  
Claudia A Serna, COA, RDH, MPH, CHES  
Sandra Giraldo, MA  
Georgina Silva-Suarez,MPHE  
Sergio Saucedo  
Yuritzi Guerrero

Florida International University

Crusada

11200 SW 8th Street, HLS II 564  
Miami, FL 33199  
Phone 305.348.2620

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## INTRODUCCION

Este manual informa sobre temas relacionados con la investigación participatoria de comunidades de base, ética en la investigación, prevención de VIH/SIDA, investigación cualitativa, investigación cuantitativa y salud oral.

Esperamos que este manual sirva de guía y brinde conocimientos los cuales van a proporcionar a la comunidad un mejor entendimiento de que es investigación, quien es el investigador y el papel que tiene la comunidad en todo el proceso de la investigación.

A medida que el interés en realizar investigaciones que involucren a la comunidad crece. Hay una necesidad grande de educar y brindar instrumentos que pueden ayudar a la comunidad en el crecimiento del conocimiento sobre cómo realizar una investigación en conjunto con los investigadores o instituciones.

Este manual tiene la intención de convertirse en una fuente educativa en el desarrollo de este en enlace con la idea de mejorar la salud en la comunidad Hispana de Homestead/Florida City.

# MÓDULO 1 INVESTIGACION PARTICIPATIVA DE COMUNIDADES DE BASE

## ***Introducción:***

En este módulo encontrarás información básica sobre la Investigación Participativa de Base Comunitaria, los fundamentos, principios y su importancia para mejorar la salud de la comunidad.

## ***Objetivos:***

- f* Entender que es la comunidad.
- f* Entender que es un enlace comunitario.
- f* Aprender cómo se realiza una investigación a través de un enlace comunitario.
- f* Definir la investigación participativa de comunidades de base.

## ***Ejercicio: ¿Qué piensas cuando...?***

- f* Alguien les comenta que en una Comunidad X se está haciendo una Investigación Participativa de Comunidades de Base.

## ***Respuesta:***

- f* La investigación participativa de comunidades de base es una colaboración en igualdad de condiciones que incluye a miembros de la comunidad, organizaciones e investigadores.

***Diga:*** Durante este módulo vamos a tratar temas como:

- f* ¿Qué es la investigación?
- f* ¿Qué es la investigación tradicional?
- f* ¿Qué es la comunidad?

- f* ¿Qué es un enlace comunitario?
- f* ¿Cuáles son los principios de los enlaces comunitarios?
- f* ¿Qué es la investigación participativa de comunidades de base?
- f* ¿Cuáles son las normas para una buena alianza entre las comunidades y el investigador?

***Pregunta: ¿Qué es investigación?***

***Diga:*** Es recoger información sobre un tema en particular.

***Pregunta: ¿Que es la investigación tradicional?***

**El investigador:**

*f*  
*f*  
*f*  
*f*  
*f*  
*f*

**La Comunidad:**

*f*  
*f*  
*f*  
*f*

**Pregunta:** ¿Cual es la relación entre la investigación tradicional y la comunidad?

**Ejemplo:** Investigación Tradicional

<i>Proceso de Investigación</i>	<i>Aplicación</i>
<b>Problema de salud</b>	<b>Obesidad en los niños</b>
<b>Comunidad</b>	<b>Escuelas públicas de Miami-Dade</b>
<b>Objetivos</b>	<ol style="list-style-type: none"><li><b>1. Obtener un perfil de los niños (edad, estatura, peso)</b></li><li><b>2. Explorar hábitos alimenticios (escuela y hogar)</b></li><li><b>3. Explorar nivel de actividad física (escuela y hogar)</b></li></ol>

<b>Instrumentos</b>	<b>Cuestionario y registro de medidas físicas</b>
<b>Análisis de los datos</b>	<ul style="list-style-type: none"> <li><i>f</i> <b>50% de los niños tienen problema de sobre peso</b></li> <li><i>f</i> <b>Los hábitos alimenticios en los hogares son inadecuados</b></li> <li><i>f</i> <b>La escuela no provee una alimentación balanceada</b></li> <li><i>f</i> <b>Mínima actividad física tanto en el hogar como en la escuela</b></li> </ul>
<b>Distribución</b>	<b>Presentaciones en distintas conferencias, publicaciones y propuestas</b>

**Pregunta: ¿Qué pasa con este tipo de investigación?**

**Diga:**

Esta investigación no atiende las necesidades a gran escala, se limita a recoger información, y se enfoca muy poco en trabajar para resolver las necesidades de la comunidad.

El investigador llega a la escuela, obtiene los permisos necesarios, recopila información, analiza los datos y publica los hallazgos. En muchas ocasiones aquí finaliza la investigación.

**Pregunta: ¿Qué es la comunidad?**

**Diga:**

La comunidad es un grupo de personas con intereses comunes que viven en la misma área.

**Pregunta: ¿Qué es un enlace comunitario?**

**Diga:**

El enlace comunitario es el proceso de trabajar colaborativamente entre un grupo de personas unidas por el área donde viven, intereses comunes, o situaciones similares, para hacer frente a problemas que afectan el bienestar de esa población.

***Pregunta: ¿Qué es la investigación a través del enlace comunitario?***

***Diga:*** La investigación a través del enlace comunitario es la contribución de personas de la comunidad asociadas al proceso de investigación.

***Pregunta: ¿Cuales son los Principios de Enlaces Comunitarios que debe tener en cuenta el investigador?***

***Diga:***

- f* Aclarar el propósito del estudio.
- f* Identificar las comunidades que se quieren estudiar.
- f* Conocer la comunidad en términos de sus condiciones económicas, estructuras políticas, normas, valores, demografía, historia, y experiencia.
- f* Conocer las ideas de los que inician las actividades para el enlace.
- f* Establecer relaciones con la comunidad, crear un clima de confianza.
- f* Buscar el compromiso de organizaciones comunitarias y sus líderes para crear procesos que ayuden a movilizar la comunidad.
- f* Aceptar el derecho de la comunidad a tomar decisiones libremente.
- f* Buscar asociarse con la comunidad para crear un cambio en ella.

***Pregunta: ¿Qué es investigación participativa de comunidades de base?***

***Diga:***

La investigación participativa de comunidades de base (CBPR por sus siglas en inglés)

- f* Involucra la participación activa de la comunidad en el proceso de investigación.
- f* Busca beneficiar directamente a la comunidad.
- f* Es una colaboración de igualdad que incluye a miembros de la comunidad, organizaciones e investigadores.
- f* Pone en acción los resultados de la investigación para mejorar la salud y el bienestar de los miembros de la comunidad.
- f* Los miembros de la comunidad hacen parte del estudio como asociados.
- f* Usa el conocimiento de la comunidad para entender los problemas de salud y diseñar actividades para mejorar el sistema del cuidado de salud.
- f* Informa directamente a los miembros de la comunidad sobre los resultados obtenidos durante la investigación.
- f* Los miembros de la comunidad también están involucrados en promover información sobre la investigación.

***Pregunta:* ¿Cuales son las normas para una buena alianza entre las comunidades y el investigador?**

***Diga:***

- f* Los aliados llegan a un acuerdo sobre la misión, los valores, las metas, y los resultados dentro de la alianza.
- f* La relación entre los aliados se caracteriza por la confianza mutua, el respeto, y el compromiso.
- f* La alianza balancea el poder entre los aliados y hace posible que se compartan los recursos entre los aliados.
- f* Existe una comunicación clara, abierta, y accesible entre los aliados.

- f* Los roles, las normas, y los procesos para la alianza están establecidos por todos los aliados.
- f* Hay aportes de todas las personas en la alianza, con la meta de mejorar continuamente la alianza y sus resultados.
- f* Los aliados comparten el crédito de la investigación.
- f* Las alianzas requieren tiempo para desarrollarse.

**Pregunta: ¿Cual es la relación del investigador y la comunidad en una investigación participativa de comunidades de base?**



## Comparación

Investigación Tradicional	Investigación Participativa de Comunidades de Base
El investigador define el problema	La comunidad identifica el problema y trabaja con los investigadores
La investigación se hace en la comunidad	la investigación se hace CON la comunidad
La comunidad participa en la investigación	La comunidad colabora en la investigación
Los investigadores ganan conocimientos	Los investigadores y la comunidad trabajan en colaboración para desarrollar y para ganar conocimiento
Los investigadores controlan el proceso de la investigación	Los investigadores y la comunidad comparten el control del proceso de la investigación
Los investigadores son dueños de los datos, controlan el uso y su distribución	El investigador y la comunidad comparten los datos y deciden la utilización y la distribución de los mismos



Desde sus puntos de vista:

***Conclusiones:***

1. El enlace comunitario es el proceso de trabajar colaborativamente entre un grupo de personas con intereses comunes.
2. La investigación por medio del enlace comunitario cuenta con la contribución de personas de la comunidad asociadas al proceso de investigación.
3. Uno de los principios del enlace comunitario es conocer a la comunidad en términos de sus condiciones económicas, estructuras políticas, normas, valores, demografía, historia y experiencia.
4. En la investigación participativa de comunidades de base, la comunidad hace parte activa en el proceso de investigación.

5. Las alianzas dentro de la investigación participativa de comunidades de base ayudan en los resultados de la investigación.

### Preguntas de repaso

1. La investigación participativa de comunidades de base es un proceso colaborativo **V**
2. En la investigación participativa de comunidades de base la comunidad tiene un rol pasivo **F**
3. La investigación participativa de comunidades de base se involucra con la comunidad **V**
4. La investigación participativa de comunidades de base es desarrollada solo por el investigador **F**
5. En la investigación participativa de comunidades de base la comunidad tiene participación en todas las fases de la investigación **V**
6. En la investigación participativa de comunidades de base la comunidad no tiene un beneficio directo en el proceso de investigación **F**
7. En la investigación participativa de comunidades de base , la comunidad tiene conocimiento e información importante para contribuir a la investigación **V**

### ***Bibliografía:***

Freire, P. (1970). *Pedagogy of the Oppressed* (Chapter I). Retrieved from <http://www.marxists.org/subject/education/freire/pedagogy/>

Israel, B. A., Eng, E., Schulz, A. J. & Parker, E. A. (Eds.).(2005). *Methods in community-based participatory research for health*. San Francisco, CA. Jossey-Bass.

Israel, B. A., Coombe, C. M. & McGranaghan R. J. (2010). Community-Based Participatory Research: A partnership approach for public health. Detroit Community-Academic Urban Research Center, Michigan Public Health Training Center, University of Michigan School of Public Health Retrieved from:  
[http://practice.sph.umich.edu/practice/dynamic/site.php?module=courses\\_one\\_online\\_course&id=391](http://practice.sph.umich.edu/practice/dynamic/site.php?module=courses_one_online_course&id=391)

McDonald, M. A., (n.d.). Practicing community-engaged research. Duke Center for Community Research. [Power Point slides]. Retrieved from <http://www.dtmi.duke.edu/dccr/community-linked-research/>

Minkler, M. & Wallerstein, N. (Eds.). (2008). *Community-based participatory research for health: From process to outcomes* (2nd Ed.). San Francisco, CA. Jossey-Bass.

Wallerstein, N. (2002). *Community-based participatory research* [Power Point slides]. Retrieved from [http://depts.washington.edu/ccph/pdf\\_files/wallerstein.pdf](http://depts.washington.edu/ccph/pdf_files/wallerstein.pdf)

## MODULO 2 ETICA EN LA INVESTIGACION

**Introducción:** En este modulo vamos a aprender todo lo relacionado con ética en la investigación.

### **Objetivos:**

- Entender que es ética.
- Entender cómo se aplica la ética en la investigación.
- Entender que es el Reporte Belmont.
- Aprender los tres principios fundamentales del Reporte Belmont.
- Conocer cuáles son las poblaciones vulnerables dentro de una investigación.
- Entender que es un consentimiento informado.

### **Diga:**

Los temas que se van a tratar en esta presentación son:

- f* Introducción a la ética
- f* ¿Qué es la ética?
- f* ¿Por qué es la ética importante dentro de una investigación?
- f* ¿Quien revisa las reglas de conducta dentro de una investigación?
- f* ¿Que es el comité de ética dentro de una investigación?
- f* ¿Cuales son los eventos históricos que influyeron las reglas de ética?
- f* ¿Que es el Informe Belmont?
- f* ¿Cuáles son los tres principios fundamentales que guían la conducta ética en la investigación?



- f ¿Quiénes son las poblaciones vulnerables dentro de una investigación?
- f ¿Qué es un consentimiento informado?

### ***Diga: Introducción a la Ética***

Al realizar una investigación con personas es importante seguir reglas las cuales brindan un trato justo y de igualdad a los participantes en el estudio.

### ***Pregunta: ¿Qué es la ética?***

#### ***Diga:***

- f La ética se relaciona con la moral.
- f Nos guía para distinguir entre lo bueno y lo malo.
- f Es un procedimiento que nos ayuda a decidir cómo actuar, analizar situaciones, y problemas complejos.
- f Son reglas de conducta.

### ***Pregunta: ¿Porque es importante la ética dentro de una investigación?***

#### ***Diga:***

#### **La ética**

- f Promueve valores tales como la confianza, responsabilidad, el respeto mutuo, cumplimiento de la ley, salud, bienestar y la justicia.
- f Guía al investigador durante el desarrollo de un estudio.
- f Da seguridad al público involucrado dentro de una investigación.
- f Considera características morales que influyen en las decisiones tomadas durante una investigación.

- f* Brinda un balance entre los derechos de los participantes y los beneficios de la investigación.

***Pregunta: ¿Quién revisa las reglas de conducta dentro de una investigación?***

***Diga:*** Las reglas de conducta son revisadas por El Comité de Ética, conocido por sus siglas en ingles (IRB) “Institutional Review Board”

***Pregunta: ¿Que es el comité de ética dentro de una investigación?***

***Diga:***

- f* Son instituciones que revisan las propuestas de investigación y verifican que se protejan los derechos e intereses de los participantes.
- f* Se asegura que los riesgos que enfrentan los participantes sean mínimos.
- f* Establece la preparación del documento “consentimiento informado” el cual explica a los participantes todo lo relacionado con la investigación.

***Pregunta: ¿Cuales son los eventos históricos que influyeron las reglas de ética?***

***Diga:*** Sucedieron eventos históricos en el pasado que influyeron las reglas de ética en el presente.

Entre ellos tenemos:

- f* Experimentos de Guerra Nazis
- f* El estudio de Sífilis en Tuskegee

***Diga: Experimentos de Guerra Nazis***

- f* Los experimentos realizados por los médicos Nazis durante la segunda guerra mundial, fueron desarrollados en millones de prisioneros en campos de concentración.

- f* Entre los experimentos se incluían: Torturas, inyecciones con gasolina y virus como también forzar a las personas a ingerir venenos.

***Diga: El estudio de Sífilis en Tuskegee***

- f* Este estudio se desarrollo en los EEUU.
- f* El estudio consistía en investigar la enfermedad Sífilis.
- f* Los participantes fueron de la raza Afro-americana.
- f* Se desarrollo por un promedio de 10 años.
- f* Los participantes no fueron informados en qué consistía realmente el estudio.
- f* Aunque la cura para la Sífilis fue encontrada, los investigadores continuaron con el estudio y no les dieron a los participantes el antibiótico que se descubrió para curar esta enfermedad.

***Pregunta: ¿Qué es el Informe Belmont?***

***Diga:***

- f* El Informe Belmont fue creado con el fin de proteger a los seres humanos durante investigaciones.
- f* Se compone de tres principios éticos fundamentales sobre los que se basan las normas de conducta ética en la investigación.

***Pregunta: ¿Cuáles son los tres Principios Éticos Primordiales del Informe Belmont?***

***Diga:*** Estos tres principios basan las reglas de conducta ética en la investigación

- f* El principio de Beneficencia
- f* El principio de Respeto a la Dignidad Humana
- f* El principio de Justicia

**Pregunta: ¿Que es el Principio de Beneficencia?**

**Diga:** El principio de Beneficencia

Se basa en la regla de no lastimar al participante durante la realización de una investigación.

Se divide en:

- f* Garantiza que el participante no sufra ningún daño durante la investigación.
- f* Asegura que la información proporcionada por el participante no sea utilizada en contra de ellos.
- f* Comparte los resultados obtenidos durante la investigación con los participantes.
- f* Toma en consideración que el grado de riesgo no exceda los beneficios.

**Pregunta: ¿Que es el Principio de Respeto a la Dignidad Humana?**

**Diga:** El principio de Respeto a la Dignidad Humana es presentado en dos ideas básicas.

- f* El derecho a la autodeterminación.
- f* El derecho del conocimiento de la información.

**Diga: El derecho a la autodeterminación:**

Los participantes tienen el derecho de:

- f* Decidir voluntariamente su participación en una investigación.
- f* Dar por terminada la participación en la investigación en cualquier momento.

**Diga: El derecho del conocimiento de la información:**

Esto implica la descripción detallada a los participantes de todos los aspectos de la investigación como:

- f* El derecho a rehusarse a participar en el estudio.
- f* La responsabilidad del investigador.
- f* Los posibles riesgos y beneficios.

***Pregunta: ¿Que es el Principio de Justicia?***

***Diga:***

Incluye dos aspectos:

- f* El derecho a un trato justo y de igualdad.
- f* El derecho a la privacidad.

***Diga: El derecho de un trato justo y de igualdad:***

- f* Selección justa y no discriminatoria de los participantes.
- f* Cumplimiento de todos los acuerdos establecidos entre el investigador y el participante.
- f* Posibilidad de contactarse con el personal que realiza la investigación.
- f* Recibir en todo momento un trato respetuoso y amable.

***Diga: El derecho a la privacidad:***

- f* Se refiere al mantenimiento de la intimidad.
- f* Los participantes tienen el derecho a que la información proporcionada sea mantenida en la más estricta confidencialidad.

***Pregunta: ¿Quiénes son las poblaciones vulnerables dentro de una investigación?***

***Diga:*** Son poblaciones las cuales presentan una condición particular.

- f* Los niños.
- f* Las personas con discapacidad mental o emocional.
- f* Las personas con discapacidad física.
- f* Las personas confinadas (prisioneros).
- f* Las mujeres embarazadas.

***Pregunta: ¿Que es un Consentimiento Informado?***

***Diga:***

- f* Es un procedimiento donde se explica claramente todo lo relacionado con el estudio.
- f* Se explican los riesgos, posibles beneficios, alternativas, y procedimientos.
- f* Da al participante la habilidad de tomar una decisión sobre su participación en el estudio.
- f* La información debe ser comunicada verbalmente antes de ser dada al participante.
- f* El consentimiento informado debe ser firmado por el participante antes de comenzar el estudio.
- f* Es importante que el investigador conteste a todas las preguntas del participante antes de que este decida firmar.

***Pregunta: ¿Que información debe de contener el consentimiento informado?***

***Diga:***

- f* El propósito del estudio.
- f* Como se va a utilizar la información que resulte del estudio.
- f* El tipo de datos que se solicitarán.
- f* La duración del estudio.

- f* La persona o institución que patrocina el estudio.
- f* El número de participantes dentro de la investigación.
- f* Los procedimientos que van a llevarse a cabo.
- f* Riesgos y beneficios potenciales.
- f* La garantía de confidencialidad.
- f* El consentimiento voluntario.
- f* El derecho a retirarse cuando el participante lo quiera.

## **Ejemplo de un consentimiento informado**

### **Consentimiento informado**

#### **A. Propósito del estudio:**

Le están pidiendo participar en un estudio de la investigación sobre los comportamientos de riesgo elevado y VIH, el virus que causa el SIDA, entre trabajadores inmigrantes Hispanos. Esta investigación la está haciendo “Florida International University”.

Esperamos aprender sobre la gente hispana potencialmente involucrada en comportamientos de riesgo de VIH. También esperamos ayudarles a evitar contagiarse de VIH. Le están pidiendo participar en este estudio porque usted es un trabajador inmigrante hispano, ha estado sexualmente activo en los últimos 3 meses, y ha estado involucrado en el alcohol y/u otra droga en los últimos 3 meses.

Participar en este estudio de investigación es su opción. La información siguiente es para ayudarle a decidir si quiere participar o no. Si lo han presionado para participar en este estudio, por favor díganos. No se involucre en el estudio solamente porque alguien quiere que usted participe.

#### **B. Procedimiento**

Si escoge participar, las próximas cosas pasaran:

1. Sera visto 4 veces por el personal del proyecto. Una vez hoy, una vez en una semana, una vez en 3 meses, y una vez en 9 meses.

2. En la visita de hoy completara una encuesta. La encuesta le hará preguntas de su salud, historial médico, vida sexual, uso de drogas, redes sociales, y aculturación. Un miembro de nuestro personal llenara la encuesta en una computadora según usted conteste. Usted puede no contestar una pregunta si usted no quiere contestarla. Puede dejar de contestar la en cualquier momento. También le preguntaremos información de cómo lo podemos encontrar. Esto es para recordarle de sus próximas citas. Usted puede decidir qué información cree usted esté bien darnos y como usted quiere que se use. Pensamos que ocupara dos horas para terminar la encuesta. Eso incluye algunos descansos cortos.
3. Al azar le asignaran (como tirando una moneda) a uno de los grupos de intervención y participara en la intervención dentro de una semana. Ni usted ni el investigador podrá escoger el grupo de intervención a donde será asignado. La sesión de intervención durara aproximadamente 4 horas. La sesión de intervención incluirá información que le puede ayudar a reducir el riesgo de adquirir o transmitir el virus de SIDA. La sesión de intervención consistirá de 5 participantes del estudio (Incluyendo a usted) y el intervencionista. El intervencionista compartirá la información, demostrara técnicas, le hará preguntas, y le dará respuestas a sus preguntas.
4. Lo volveremos a entrevistar de 3 a 9 meses después de su entrevista inicial. Porque estas entrevistas son vitales para el estudio, es importante que usted nos proporcione información que nos permita contactarlo en estos tiempos. También pedimos permiso para contactar gente que nos ayuden a contactarlo a usted, como familiares y compañeros de cuarto.

El estudio terminara para usted después de la entrevista a los 9 meses.

### **C. Riesgos/ Malestares**

Los posibles riesgos y malestares que puede tener durante este estudio incluyen:

1. Pueden haber preguntas durante la entrevista, especialmente las relacionadas con el uso de drogas ilegales y comportamientos sexuales, que sean desagradables o difíciles de contestar. Si hay preguntas que usted no desee contestar, no las tiene que contestar. También puede dejar de hacer la entrevista en cualquier momento y retirarse del estudio.
2. El estudio puede implicar compartir historias personales con el entrevistador /intervencionista. Algunos de estos asuntos le podrían causar sentirse inquieto o apenada. Si hay algunas preguntas que usted no quiera contestar, no tiene que contestar. También, puede dejar de tomar parte en cualquier sesión del estudio en su totalidad a cualquier hora.

#### **D. Beneficios**

Los beneficios potenciales de su participación en este estudio incluyen:

1. Será aconsejado de los riesgos y cómo prevenir la infección de VIH, enfermedades transmitidas por sexo, y otros problemas de salud que pueden venir del uso de alcohol y otras drogas. También lo podemos referir a servicios sociales y cuidado de salud. Los referidos que obtengan dependen de lo que usted necesite y de los servicios que haya en su área.
2. Usted conseguirá ayuda para encontrar un programa de tratamiento de alcohol/drogas si usted lo pide. Usted también puede solicitar información de pruebas de VIH y le ayudaremos a establecer una cita con la agencia de prueba.

#### **E. Declaración de confidencialidad**

La información que usted nos dé se mantendrá privada. Esto es porque a este estudio le fue dado un certificado de confidencialidad. Esto significa que todo lo que nos diga no tiene que ser dado a nadie, aunque lo ordene una corte, al menos que usted lo autorice. Pero bajo la ley, tenemos que reportar al estudio sospechas de abuso de niños(o si usted nos dice que planea causar serios daños así mismo o a otros). Para proteger su privacidad, le daremos un número de identificación del estudio para que su nombre no esté en los formularios ni los resultados del examen. Le pediremos su nombre y dirección para recordarle de sus próximas citas. Su nombre y dirección serán guardados separados de la encuesta y los resultados del examen. Una sola hoja será utilizada para ligar su nombre con su número de estudio. Esta hoja será mantenida en un cajón de archivos bajo llave en “Florida International University”. Solamente el personal mayor del proyecto tendrá acceso a este cajón. Esta hoja será destruida 6 meses después del final del estudio. La información de este estudio se puede publicar en diarios científicos o presentados en las reuniones científicas pero su identidad será mantenida terminante confidencial.

No se le permitirá estar en este estudio más de una vez. Para prevenir esto, mantendremos su nombre y otra información de contacto en nuestro registro computarizado que solo se puede abrir por el personal del estudio hasta que sea destruido 6 meses después que termine el estudio (hasta 3 años o más). Solo personal del estudio con necesidad de esta información tendrá acceso a la información.

#### **F. costo**

No habrá ningún costo para usted como resultado de tomar parte en este estudio.

#### **G. Compensación:**

Usted recibirá \$30 por tomar su tiempo en la entrevista base. Usted recibirá \$40 adicionales por participar en la sesión de intervención. Usted también recibirá \$40 adicionales por participar en

la entrevista a los 3 meses. Finalmente, usted recibirá \$50 adicionales por participar en la entrevista a los 9 meses.

**H. Alternativas a participar**

Una alternativa seria no tomar parte en el estudio. Aunque no tome parte en el estudio usted podría tener acceso a las pruebas gratis y a la consejería, referidos, y servicios sociales. Nosotros le proveeremos información que necesite para tener acceso a esos servicios.

**I. Oferta a contestar preguntas**

Si tiene alguna pregunta o preocupación en cuanto a tomar parte en este estudio por favor contacte a:

Jesús Sánchez al (305)248-1811

**J. Participación Voluntaria y Testimonio de Retiro**

El tomar este estudio es voluntario. Su opción de participar o no participar no interferirán con su derecho a cuidado médico u otros a servicios a los cuales tienen derecho. Usted está renunciando a cualquier reclamo legal o derechos por tomar parte en este estudio. Si decide tomar parte, usted puede dejar de tomar parte en cualquier momento. Usted no tendrá penalidades o pérdidas de sus beneficios.

**K. Responsabilidad financiera**

Si usted es dañado por esta investigación, nosotros arreglamos su cuidado médico. Sin embargo, no se ha apartado dinero para pagar cuidado o para compensarlo si ocurre un contratiempo.

**L. Acuerdo**

Este estudio se me ha explicado. Yo voluntariamente tomo parte en esta investigación. He tenido oportunidad de hacer preguntas y me han contestado. Mi decisión de participar en este estudio, salirme de este estudio, o de negarme a contestar cualquier pregunta, no afectara mi presente o futuro estado como paciente, estudiante, o empleado de Florida International University o cualquier otra institución participante ahora o en el futuro. Recibiré una copia de este formulario de consentimiento. Yo entiendo que este estudio esta designado para personas que tengan 18 años de edad o más.

**Nombre del participante**

**Firma del participante del estudio**

**Fecha**

**Nombre del testigo**

**Firma del testigo**

**Fecha**

- Yo personalmente explique la investigación al sujeto y he contestado todas sus preguntas
- Yo creo que él/ella entiende la información dada en este consentimiento informado, libremente y consiente tomara parte en el estudio.
- He sido testigo de todo el proceso del consentimiento

**Nombre del investigador/persona  
Que obtiene el consentimiento  
Informado**

**Firma**

**Fecha**

### **Ejercicio: Preguntas del consentimiento informado**

En el consentimiento que les hemos distribuido por favor identifique:

**1. Pregunta:** ¿Cuál es el propósito del estudio en el consentimiento informado?

**Respuesta:** Aprender sobre la gente hispana potencialmente involucrada en comportamientos de riesgo de VIH.

**2. Pregunta:** ¿Durante el estudio que tipo de riesgo o malestares habrán?

**Respuesta:** Puede haber preguntas durante la entrevista, especialmente las relacionadas con el uso de drogas ilegales y comportamientos sexuales, que sean desagradables o difíciles de contestar. El estudio puede implicar compartir historias personales con el entrevistador.

**3. Pregunta:** ¿Qué tipo de beneficios obtendrá el participante durante el estudio?

**Respuesta:** Sera aconsejado de los riesgos y cómo prevenir la infección de VIH, enfermedades transmitidas por sexo, y otros problemas de salud que pueden venir del uso de alcohol y otras drogas.

**4. Pregunta:** ¿En el estudio su participación es voluntaria?

**Respuesta:** El tomar parte en este estudio es voluntario.

**5. Pregunta:** ¿Durante el estudio el participante puede retirarse en cualquier momento sin que le afecte?

**Respuesta:** Si, puede retirarse en cualquier momento, es su decisión de participar en el estudio o de salirse.

## **Conclusiones:**

### **Informe:**

- f* La ética ayuda a identificar lo bueno, y lo malo dentro de una investigación.
- f* Una investigación debe ser siempre ética.
- f* La participación en una investigación debe ser voluntaria.
- f* Información necesaria dentro de un consentimiento informado:
  - 9 Quien es el investigador.
  - 9 El propósito de la investigación.
  - 9 El tiempo que durara la participación.
  - 9 El derecho del participante a retirarse en cualquier momento.
  - 9 Los posibles beneficios para el individuo.
  - 9 El compromiso de mantener la confidencialidad.

## **Preguntas de repaso**

1. Una investigación debe siempre ser ética. V
2. En la investigación todas las poblaciones (Ej. Mujeres, Hombres, Niños, Confinados) son consideradas iguales. F
3. La participación en una investigación debe ser voluntaria. V
4. Lo más importante en una investigación son los beneficios que obtenga el investigador. F
5. Una investigación se puede llevar a cabo sin que los participantes firmen el consentimiento informado. F

6. Si un participante no quiere seguir participando en una investigación luego de haber comenzado el estudio no podrá abandonar la investigación. F
7. Algunas poblaciones son más importantes que otras y merecen obtener más beneficios (Ej. Hispanos vs. Americanos) F
8. Si una persona participa de una investigación debe obtener más beneficios que riesgo. V
9. El investigador principal es el responsable de la investigación ante el Comité de Derechos Humanos (IRB por sus siglas en inglés) V
10. La ética nos ayuda a identificar lo bueno y lo malo, es un procedimiento que nos ayuda a decidir cómo actuar. V
11. Un investigador tiene que explicar porque incluye unas poblaciones y excluye otras. V
12. Beneficencia, consentimiento informado y respeto a la dignidad humana son los tres principios principales establecidos en el Informe Belmont. F
13. Los niños pueden firmar el consentimiento y participar en una investigación. F
14. Las investigaciones con sujetos humanos tienen que contar con la aprobación del Comité de Derechos Humanos (IRB). V

### ***Bibliografía:***

- f* ANDER-EGG, Ezequiel (1995). Técnicas de investigación social. Editorial Lumen.
- f* Buenos Aires.
- f* ARY, Donald et al. (1989). Introducción a la investigación pedagógica. Mac Graw
- f* Hill. México.
- f* BABBIE, Earl (2000). Fundamentos de la investigación social. International Thom-
- f* son Editores. México.
- f* BERNAL, César (2000). Metodología de la investigación para administración y eco-
- f* nomía. Pearson. Bogotá.
- f* BISQUERRA, Rafael (1998). Métodos de investigación educativa. Ediciones CEAC.
- f* Barcelona.
- f* LEÓN, Orfelio y MONTERO, Ignacio (1995). Diseño de investigaciones. McGraw-
- f* Hill. Madrid.
- f* MELTZOFF, Julián (2000). Crítica a la investigación. Alianza Editorial. Madrid.
- f* NAMAKFOROOSH, Mohammad (1996). Metodología de la investigación. Limusa,
- f* Noriega Editores. México.
- f* PARDINAS, Felipe (1991). Metodología y técnicas de investigación en ciencias so-

- f* ciales. Siglo Veintiuno Editores. México.
- f* PARDO, Graciela y CEDEÑO, Marcela (1997). Investigación en salud. Factores so-
- f* ciales. McGraw-Hill Interamericana. Bogotá.
- f* POLIT, Denise y HUNGLER, Bernadette (1997). Investigación científica en ciencias
- f* de la salud. McGraw-Hill Interamericana. México.
- f* SALKIND, Neil (1999). Métodos de investigación. Pearson Educación. México.
- f* SJOBERG, Gideon y NETT, Roger (1986). Metodología de la investigación social.
- f* Editorial Trillas. México.
- f* TRAVERS, Robert (1981). Introducción a la investigación educacional. Editorial P

## MODULE 3 PREVENCIÓN DE VIH Y EL SIDA

**Introducción:** Este módulo está diseñado para brindar información a los participantes acerca del VIH, el SIDA y su prevención.

### **Objetivos:**

1. Definir que es VIH y SIDA.
2. Identificar las diferencias entre VIH y SIDA.
3. Describir las formas más comunes de transmisión de VIH.
4. Informar sobre cómo se puede prevenir el contagio de VIH.
5. VIH y su efecto en la población hispana en los EE.UU.

### **Diga:**

- Durante esta presentación vamos aprender temas relacionados con el VIH, el SIDA y su prevención.
- Mucha de esta información quizás no aplique para usted. Es importante aprender y conocer sobre VIH y SIDA para poder ayudar y enseñar a las personas de su comunidad.

### **Diga:**

- Ahora vamos a hacer unas preguntas, para saber que tanto conocimiento tienen sobre el tema que vamos a tratar.
- Si usted no sabe las respuestas no se preocupe, la idea de esta presentación es enseñarle todo lo relacionado con el VIH, el SIDA, y su prevención.

**Diga:** Ahora vamos hacer unas preguntas para saber que tanto saben sobre VIH

1. **Pregunta:** ¿Alguien de ustedes ha escuchado las palabras VIH – SIDA o HIV-AIDS?
2. **Pregunta:** ¿El VIH es un virus?

**Diga:** La respuesta es SI

**3. Pregunta:** ¿Alguien de ustedes sabe cuál es la diferencia entre el VIH y el SIDA?

**4. Pregunta:** ¿Una persona puede infectarse con el virus del VIH por medio de sangre contaminada, fluidos sexuales y leche materna infectada?

**Diga:** La respuesta es SI

**5. Pregunta:** ¿El virus del VIH se puede prevenir utilizando condones?

**Diga:** La respuesta es SI

**Diga:** Ahora vamos a hablar y aprender sobre el VIH, el SIDA y su prevención.

**Diga:** Durante esta presentación vamos a tratar temas como:

- Definición de VIH y el SIDA
- Cuál es la conexión entre el VIH y el SIDA
- Como se trata el VIH
- Como se transmite el VIH
- Las formas más comunes de infectarse con VIH
- Formas en las cuales una persona se puede infectar con VIH
- Como una persona no se puede infectar con VIH
- Síntomas del VIH y el SIDA
- Como se detecta el VIH
- Pruebas de detección del VIH
- Educación sobre la prevención del VIH y del SIDA
- Como se puede prevenir la transmisión del VIH
- VIH y su efecto en la población hispana de los EEUU

***Pregunta: ¿Cual es la definición del VIH y del SIDA?***

***Diga: ¿Qué es el VIH?***

- Las siglas VIH significan: Virus de Inmunodeficiencia Humana
- El VIH es un virus
- Los virus tales como el VIH no pueden crecer por sí mismos, deben infectar a células del cuerpo para duplicarse.
- El sistema inmunológico del cuerpo a menudo encuentra y mata los virus fácilmente, pero el VIH ataca el sistema inmunológico dejándolo indefenso para combatir la enfermedad.

***Diga: ¿Qué es el SIDA?***

- Las siglas SIDA significan: Síndrome de Inmunodeficiencia Adquirida.
- El SIDA es una enfermedad.
- A una persona se le diagnostica con SIDA, cuando su sistema inmunológico es demasiado débil para combatir las infecciones.

### **Conexión entre el VIH y el SIDA**

***Pregunta: ¿Cuál es la conexión entre el VIH y el SIDA?***

***Diga:***

- El virus del VIH provoca el desarrollo del SIDA, al dañar las células del sistema inmunológico hasta que este ya no puede combatir otras infecciones que a menudo podría evitar.

- Se tarda un periodo promedio de 10 años para que alguien infectado con el virus del VIH desarrolle SIDA, este promedio depende de cada persona infectada.

### **Tratamientos para el VIH y el SIDA**

#### ***Pregunta: ¿Cómo se trata el VIH?***

##### ***Diga:***

- No hay cura para el VIH o el SIDA.
- Existen tratamientos a base de medicinas que pueden ayudar a reducir la enfermedad.
- Los medicamentos se llaman antiretrovÍricos, estos reducen los niveles de VIH en el cuerpo, de manera tal que el sistema inmunol3gico pueda recuperarse y funcionar mejor.
- Estos medicamentos le permiten a personas que son VIH positivas gozar de una vida larga y saludable y deben ser tomados todos los dÍas por el resto de la vida.

### **Transmisión del VIH**

#### ***Pregunta: ¿Cómo se trasmite el VIH?***

##### ***Diga:***

- El VIH se encuentra en la sangre y fluidos sexuales de una persona infectada como también en la leche materna de una madre infectada.
- El virus no puede vivir fuera del cuerpo, para ser infectado se necesita que fluidos que contengan el virus entren dentro del cuerpo de una persona.
- La transmisión del VIH se produce cuando una cantidad suficiente de fluidos infectados ingresa en la sangre de otra persona o pasa por delicadas mucosas como las que se encuentran en la vagina, recto y uretra.

***Diga:* Ahora vamos a mirar una grafica, la cual nos va a ayudar a observar que tan fácil se transmite el VIH.**

[Adaptado de VAMOS and the National Coalition of Advocates for Students, 1996].

**Ejercicio: La Pirámide y el VIH**

**Diga:** Vamos a mirar la gráfica y luego vamos a responder a preguntas

- **1. Pregunta:** ¿Cuántas personas se necesitan para que se transmita el virus del VIH?

**Respuesta:** Se necesitan dos personas. La persona infectada y la persona que se puede infectar.

- **2. Pregunta:** ¿Cuántas personas según la grafica están infectadas con el virus del VIH durante los primeros 2 días?

**Respuesta:** 4 personas

- **3. Pregunta:** ¿Cuántas personas aparecen infectadas con el virus del VIH en la grafica en el día 4?

**Respuesta:** 16 personas

- **4. Pregunta:** ¿Cuántas personas están infectadas en el día 5?

**Respuesta:** 32 personas

**Diga:**

- El virus del VIH se puede transmitir de forma fácil y rápida si no se toman las medidas necesarias de protección.
- Si alguna de las personas en el día 1 se hubieran protegido, el virus no se hubiera transmitido.

### **Formas más comunes de infectarse con VIH**

**Pregunta:** ¿Cuáles son las formas más comunes de infectarse con VIH?

***Diga: Las formas más comunes son:***

- Relaciones sexuales sin protección con una persona infectada.
- Drogas inyectables: El VIH puede transmitirse al utilizar equipos que han sido utilizados antes por personas infectadas.
- De madre a hijo: El VIH se puede transmitir de una madre infectada a su hijo durante el embarazo, el parto y la alimentación por leche materna.

**Explicación más detallada sobre las formas de infectarse con VIH**

***Diga: Ahora vamos a discutir más a fondo las formas más comunes de infectarse con el virus del VIH***

***Diga: Relaciones sexuales sin protección con una persona infectada***

**Sexo Vaginal**

- El VIH se encuentra en los fluidos sexuales de una persona infectada.
- Para un hombre, esto significa los fluidos de la pre-eyaculación y el semen que salen del pene antes y durante el sexo.
- Para una mujer, esto significa que el VIH se encuentra en los fluidos vaginales que son producidos por la vagina para mantenerla limpia y favorecer la relación sexual.
- Si un hombre con VIH tiene relaciones sin un condón, el fluido infectado puede transmitirse a la mujer a través de la vagina. Este riesgo se incrementa si la mujer tiene una cortada adentro o alrededor de su vagina facilitando que el fluido infectado ingrese en la sangre. Tal cortada puede no ser siempre visible y podría ser tan pequeña que la mujer no podría saberlo.
- Si una mujer con VIH tiene relaciones sexuales sin el uso de un condón, el VIH podría ingresar en la sangre del hombre a través de un área lastimada en su pene.
- Si existe algún contacto con la sangre durante el sexo, se incrementa el riesgo de infección. Por ejemplo, si las relaciones sexuales ocurren durante el período de una mujer.

## **Sexo anal**

- Si una pareja tiene relaciones anales el riesgo de infección es mayor que en las relaciones vaginales.
- Las relaciones sexuales anales sin protección entre hombres es uno de los mayores riesgos de transmisión del virus del VIH.
- El recubrimiento del ano es más delicado que el de la vagina por lo que se puede dañar más fácil durante la relación sexual.
- Cualquier contacto con sangre durante el sexo anal aumenta el riesgo de infección.

## **Sexo oral**

- El sexo oral con una persona infectada tiene un bajo riesgo de infección con VIH ya que la saliva no transmite el virus.
- Si una persona tiene encías sangrantes, pequeñas cortadas o úlceras en algún lugar de su boca y está infectada con el virus del VIH, puede transmitir el virus a un hombre o una mujer durante el sexo oral.

## **Drogas inyectables**

- Los usuarios de drogas inyectables son uno de los grupos de más alto riesgo de contraer el VIH.
- Compartir equipo inyectable facilita la transmisión del virus del VIH.
- Compartir agujas, jeringas, cucharas, y filtros se considera tres veces más riesgoso que las relaciones sexuales.

## **Transfusiones de Sangre**

- Algunas personas han sido contagiadas a través de la transfusión de sangre infectada.
- Por estos días, en la mayoría de los países la sangre utilizada para transfusiones es examinada en busca de VIH.

## **Transmisión de madre a hijo**

- Una mujer embarazada infectada puede transmitirle el virus a su bebé antes de nacer como también durante el parto.
- El VIH también puede transmitirse durante la alimentación por la leche materna.
- Si una mujer sabe que está infectada con VIH, existen medicamentos que puede tomar para reducir las posibilidades de que su hijo se infecte.

## **Infecciones en Servicios de Salud**

- Hospitales y clínicas toman medidas preventivas para evitar la contaminación del virus del VIH. Las medidas incluyen la utilización de instrumentos estériles, y el uso de guantes entre otros.
- En raras ocasiones, los trabajadores de la salud se han infectado con VIH al pincharse con agujas que contenían sangre infectada. Algunos se han contagiado por una cortada o al salpicarse de sangre infectada la cual entro en los ojos o el interior de la nariz.

## **Tatuajes/pirsin**

- Cualquier cosa que permita el paso de los fluidos corporales de otra persona en el cuerpo presenta un riesgo.
- Si el equipo no ha sido esterilizado antes de hacer el tatuaje o pirsin, podría haber un riesgo de exposición si la persona anterior era VIH positivo.
- Existen reglas para salones de tatuaje y pirsin las cuales aseguran que todos los instrumentos utilizados sean esterilizados.

## **No puede infectarse con VIH y el SIDA a través de . . .**

### ***Pregunta: ¿Sabe usted como no se infecta con VIH?***

#### **Los besos**

- Para infectarte con VIH se debe recibir una cantidad grande del virus en la sangre.
- La saliva contiene VIH, pero el virus sólo está en cantidades tan pequeñas que no se puede transmitir.
- A menos que ambas personas tengan heridas abiertas en sus bocas, o encías sangrantes, no existe riesgo de transmisión en los besos boca a boca.

#### **Los Insectos**

- Los estudios realizados por muchos investigadores no han encontrado evidencia de transmisión de VIH a través de picaduras de insectos, incluso en áreas donde existen muchos casos de SIDA y grandes poblaciones de insectos tales como los mosquitos.
- El VIH sólo vive por un corto tiempo y no puede reproducirse en el interior de un insecto. Si el virus ingresa en un mosquito u otro insecto que succiona o pica, el insecto no se infecta y no puede transmitir VIH a la próxima persona que pica.

#### **Los estornudos, la tos, compartir vasos/ tazas, etc.**

- El VIH no puede reproducirse afuera del cuerpo.
- El VIH no sobrevive en el ambiente y esto hace que la posibilidad de transmisión sea poca.
- El VIH no puede transmitirse por escupir, estornudar, compartir vasos, cubiertos o instrumentos musicales.
- Una persona no se puede infectar en piletas, duchas o por compartir instalaciones para lavarse las manos o asientos del sanitario.

### **Drogas inyectables con agujas esterilizadas**

- Inyectarse con una aguja esterilizada no transmitirá el virus del VIH siempre y cuando esta no haya sido compartida.

### **Sexo protegido**

- Utilizados de forma adecuada y consistente, los condones son altamente efectivos en la prevención de la transmisión del VIH.
- Los condones son efectivos en la prevención del VIH tanto durante el sexo vaginal como anal y también pueden ayudar a reducir los riesgos en el sexo oral.

### **Ejercicio: ¿Qué tan rápido se puede contagiar una persona con el virus del VIH?**

***Diga:* El objetivo es conocer cómo se puede contagiar una persona con el virus del VIH si no utiliza protección durante una relación sexual.**

***Diga:***

- **Por favor escriba sus iniciales en la parte de arriba de la tarjeta que se le entrego**
- **Busque 3 personas a las cuales usted le va a pedir que coloquen las iniciales en su tarjeta**
- **Por favor tomen asiento**

***Diga:* Ahora vamos a explicar las tarjetas:**

- **Las personas que tienen la letra D en su tarjeta, significa que tienen el virus del VIH y tuvieron relaciones sexuales sin protección. Todos aquellos que colocaron su nombre en la tarjeta de la persona que tiene la D, pueden estar contagiados con el virus pues tuvieron relaciones sin protección.**

- Las personas que tienen la letra C utilizaron un condón. Todos aquellos que colocaron su nombre en la tarjeta no estuvieron en riesgo de contraer VIH.
- Las personas que tienen la letra A se abstuvieron de tener relaciones sexuales con las otras personas de la tarjeta.
- Las personas con la letra U tuvieron sexo sin protección y pudieron estar en riesgo de contraer VIH si su compañero estaba infectado.

*Preguntas:*

- ¿Cómo se sintieron durante el juego?
- ¿Cómo se siente saber que se puede estar infectado con el virus del SIDA?

**Ejercicio de Tarjetas**

**D**

Iniciales

1. \_\_\_\_\_

2. \_\_\_\_\_

3. \_\_\_\_\_

**C**

Iniciales

1. \_\_\_\_\_

2. \_\_\_\_\_

3. \_\_\_\_\_

## A

Iniciales

1. \_\_\_\_\_

2. \_\_\_\_\_

3. \_\_\_\_\_

## U

Iniciales

1. \_\_\_\_\_

2. \_\_\_\_\_

3. \_\_\_\_\_

## Síntomas del VIH y el SIDA

***Pregunta: ¿Cuales son los Síntomas del VIH y el SIDA?***

***Diga: Los síntomas del VIH***

- Algunas personas experimentan una especie de gripe, sarpullido o se les inflaman los ganglios durante un corto período después de haberse infectado.
- Estos síntomas también son comunes en enfermedades de menor gravedad y esto significa que no necesariamente la persona está infectada.
- Es importante recordar que una persona con VIH puede transmitir el virus de forma inmediata después de infectarse, incluso si se siente saludable.
- No es posible afirmar a simple vista que una persona está infectada con el virus del VIH.



- La única manera de saber con seguridad si alguien está infectado con el virus del VIH es que esa persona se someta a una prueba de detección del VIH.

### ***Diga: Los síntomas del SIDA***

- A una persona se le diagnostica con SIDA cuando ha desarrollado un síntoma relacionado con la enfermedad. Lo anterior se denomina infección oportunista.
- Las infecciones se denominan ‘oportunistas’ porque aprovechan la oportunidad que les ofrece el sistema inmunológico debilitado.
- Es posible que a alguien se le diagnostique con SIDA incluso si no ha desarrollado una infección oportunista.
- El SIDA se puede diagnosticar cuando el número de células del sistema inmunológico (células CD4) en la sangre de una persona VIH positivo se reducen a un cierto nivel.

### ***Pregunta: ¿Cómo se detecta el VIH?***

#### ***Diga: Las pruebas de anticuerpos***

- Cuando una persona está infectada con el virus del VIH, el cuerpo responde con la producción de anticuerpos.
- Las pruebas de VIH buscan anticuerpos contra el virus en la sangre, la saliva o la orina.
- Si se detectan anticuerpos contra el VIH, la persona está infectada.

### ***Pregunta: ¿Qué es el periodo de incertidumbre?***

#### ***Diga:***

- El ‘período de incertidumbre’ tiene un promedio de tres meses y es un término que se utiliza para describir el tiempo que transcurre entre la infección del VIH y la producción de anticuerpos.

- Durante este período, una prueba de anticuerpos puede resultar negativa, incluso si la persona está infectada con VIH.
- Es muy importante tener en cuenta que si una persona está infectada con VIH, aún puede transmitir el virus a otras personas durante el período de incertidumbre

### **Tipos de Pruebas de Detección del VIH**

***Pregunta: ¿Cuales son las pruebas de detección del VIH?***

***Diga:***

#### **Prueba rápida de detección del VIH OraQuick.**

- La prueba rápida puede producir resultados en 20 minutos.
- Se pueden utilizar muestras de sangre o saliva.
- Son fáciles de usar y no se necesitan instalaciones clínicas ni personal altamente capacitado para su realización.
- Después de haber obtenido resultados positivos en una prueba rápida, debe realizarse una prueba confirmatoria. Los resultados de esta última pueden tardar de varios días a varias semanas.

#### **Prueba de detección del VIH-Elisa**

- Es una prueba donde se buscan anticuerpos en la sangre de una persona.
- La prueba ELISA es muy sensible y en consecuencia, detecta pequeñas cantidades de anticuerpos contra el VIH.

### **Educación sobre la prevención del VIH y el SIDA**

***Pregunta: ¿Quien necesita información sobre la prevención del VIH?***

***Diga:***

- Cualquier persona puede estar en riesgo de contraer el virus del VIH, por eso es importante la educación de la transmisión de esta enfermedad a toda la población.
- Es importante mantener informado sobre la prevención del VIH a los grupos en riesgo como hombres que tienen sexo con otros hombres, personas que utilizan drogas inyectables y trabajadoras sexuales.

***Diga: La prevención del VIH necesita llegar a personas en riesgo de contraer la enfermedad y a aquellas que la tienen:***

- Personas que no tienen la enfermedad necesitan intervenciones para aprender a protegerse del virus del VIH.
- Personas que ya están contaminadas con el virus, necesitan conocer acerca de su estado para evitar la contaminación de otras personas, al igual que información sobre medicamentos y tratamientos disponibles.

**¿Cómo se puede prevenir la transmisión del VIH?**

***Pregunta: ¿Cómo evitar la transmisión sexual del VIH?***

***Diga:***

- Abstinencia sexual o tardar la primera relación sexual
- Ser fiel a su pareja o tener menos parejas sexuales
- El uso del condón

***Diga: ¿Cómo evitar la transmisión del VIH a través de la vía sanguínea?***

- Una persona puede protegerse de esta infección al asegurarse de que la sangre infectada no ingrese en su cuerpo.
- Los consumidores de drogas inyectables que comparten jeringas para realizar estas prácticas están en riesgo de contraer la infección.
- Los trabajadores de la salud pueden estar expuestos a la infección en sus trabajos. La forma más eficaz de evitar el riesgo de infección es el lavado de las manos y el uso de guantes, delantales y lentes protectores.

***Diga: ¿Cómo evitar la transmisión del VIH de madre a hijo?***

- Este tipo de transmisión se puede evitar a través del uso de drogas antiretrovíricas, las cuales reducen las posibilidades de que el niño se infecte. Una vez que el niño ha nacido, las prácticas de alimentación segura también pueden reducir el riesgo de la transmisión de la infección
- La realización de pruebas de detección del VIH durante el embarazo es una medida importante de prevención.

***Ejercicio: Riesgo de contraer VIH: Luz roja, luz amarilla, luz verde***

***Diga:***

- **Ahora vamos realizar un juego en el cual se van a identificar que situaciones son riesgosas, no tan riesgosas y las cuales no presentan ningún riesgo.**

SEXO VAGINAL CON CONDÓN

SEXO ORAL EN UN HOMBRE SIN CONDÓN

SEXO ORAL EN UN HOMBRE CON CONDÓN

SEXO ANAL CON CONDÓN

SEXO ANAL SIN CONDÓN

MASTURBACIÓN

MASTURBACIÓN MUTUA

BESO MOJADO

BESO SECO

MASAJE

BAÑARSE JUNTOS

CONVERSACIÓN ROMÁNTICA

COMPARTIR JERINGAS CON UNA PERSONA QUE ES DROGADICTA

INYECTARSE DROGAS SIN COMPARTIR JERINGAS

TENER RELACIONES SEXUALES CON MUCHOS COMPAÑEROS SEXUALES SIN UTILIZAR UN CONDÓN

TENER RELACIONES SEXUALES CON MUCHOS COMPAÑEROS SEXUALES Y UTILIZAR UN CONDÓN

TENER RELACIONES SEXUALES CON UNA PERSONA QUE SE INYECTA DROGAS SIN PROTECCIÓN

TENER RELACIONES SEXUALES CON UNA PERSONA QUE SE INYECTA DROGAS CON PROTECCIÓN TENER

RELACIONES CON UNA PERSONA QUE TIENE MUCHOS COMPAÑEROS SEXUALES SIN PROTECCIÓN TENER

RELACIONES CON UNA PERSONA QUE TIENE MUCHOS COMPAÑEROS SEXUALES CON PROTECCIÓN TENER

RELACIONES SEXUALES CON UNA MUJER QUE ESTE TENIENDO RELACIONES CON OTRA MUJER TENER

RELACIONES CON UN HOMBRE QUE ESTÁ TENIENDO RELACIONES SEXUALES CON OTRO HOMBRE

COMPARTIR UTENSILIOS CON UNA PERSONA QUE TIENE SIDA

***Diga:* Vamos a leer las tarjetas y con su ayuda vamos a colocar los colores que corresponden al riesgo de contraer VIH.**

***Diga:***

***Alto riesgo (Rojo)***

*Moderado el riesgo (Amarillo)*

*No tiene riesgo (Verde)*

## **VIH y su efecto en la población Hispana en los EEUU**

***Diga: Ahora vamos a hablar sobre el VIH y el SIDA y su efecto en la población Hispana en los EEUU***

### ***Informe: El VIH en el 2007***

*f* La epidemia del VIH es una seria amenaza para la comunidad hispana.

*f* Los hispanos representaron el 18% de los nuevos diagnósticos de VIH.

*f* Los hispanos representaron el 17% de las personas que viven con VIH en los EEUU.

*f* El VIH fue la cuarta causa principal de mortalidad entre hombres y mujeres de origen hispano de 35 a 44 años.

*f* En las mujeres hispanas que viven con VIH, las formas más comunes de transmisión fueron el contacto heterosexual de alto riesgo y el consumo de drogas inyectables.

*f* En los hombres hispanos estadounidenses que viven con el VIH, las formas más comunes de transmisión del VIH fueron (en orden) :

*f* contacto sexual con otros hombres

*f* consumo de drogas inyectables

*f* contacto heterosexual de alto riesgo

### ***Diga: El SIDA en el 2007***

*f* Los hispanos representaron el 19% de los nuevos diagnósticos de SIDA.

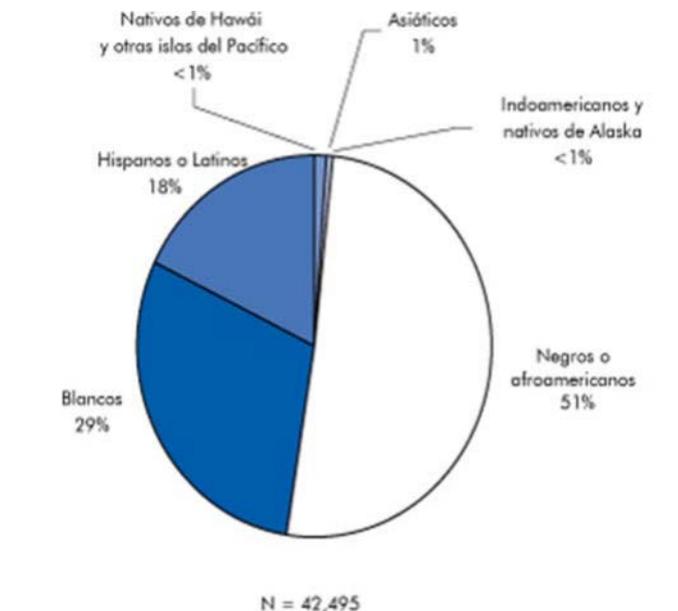
*f* Los hispanos representaron el 19% de todas las personas que viven con SIDA en los EEUU.

f Con respecto a las tasas de casos de SIDA en adultos y adolescentes estadounidenses de todas las razas y grupos étnicos, los hispanos fueron el tercer grupo demográfico más afectado después de los negros o afroamericanos y los nativos de Hawái y otras personas de las islas del Pacífico.

f La tasa de nuevos diagnósticos de SIDA entre los hombres hispanos es tres veces mayor que la de los hombres blancos, y la tasa entre las mujeres hispanas es cinco veces más alta que la de las mujeres blancas.

f Para finales del 2007, se calculó que habían muerto 82,894 hispanos con SIDA en los EEUU.

### Raza o grupo étnico de las personas (incluidos los niños) a quienes se les diagnosticó el VIH/SIDA en el 2007



**Diga:** Sitios donde se pueden hacer las pruebas de VIH

- TM **Asociación Campesina** 450 Davis Parkway, Florida City, FL 33034 (305)247-0072  
Services: HIV
- TM **Sembrando Flores Incorporated**  
TM 29355 S Federal Highway Homestead, Florida 33030Ph: 305-247-2438 Services: HIV
- TM **Everglades Health Center**  
19300 SW 376th St Florida City, Florida 33034Ph: 305-246-4607 Services: HIV, STD
- TM **Miami-Dade County Health Department**  
1600 NW 6th Ct Florida City, Florida 33034Ph: 305-242-2444 Services: HIV, STD
- TM **Community Health of South Dade Incorporated**  
810 W Mowry St Homestead, Florida 33030Ph: 305-248-4334 Services: HIV, STD
- TM **South Dade Health Center**  
13600 SW 312th St Homestead, Florida 33033Ph: 305-242-6069 Services: HIV, STD
- TM **West Perrine Health Center**  
13600 SW 312th St Homestead, Florida 33033Ph: 305-248-4334 Services: HIV, STD
- TM **Naranja Health Center**  
13805 SW 264th St Naranja, Florida 33032Ph: 305-258-6813 Services: HIV, STD
- TM 450 Davis Parkway, Florida City, FL 33034 (305)247-0072 Services: HIV
- TM **Sembrando Flores Incorporated**29355 S Federal Highway Homestead, Florida  
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- TM **Naranja Health Center**  
13805 SW 264th St Naranja, Florida 33032Ph: 305-258-6813 Services: HIV, STD

## *Conclusiones*

**Diga:** Ahora vamos a hacer un resumen del modulo de prevención del VIH/SIDA

***Diga: Todos pueden prevenir el VIH y el SIDA. ¡Es su elección! Usted puede evitar contraer VIH:***

***Diga:***

- Evitando tener sexo oral, anal y vaginal.
- Siempre utilizando un condón durante el sexo oral, anal o vaginal.
- Nunca compartiendo agujas o jeringas.
- No darle leche materna a un infante si la madre está infectada.

***Diga: ¡Cualquiera puede contraer VIH y el SIDA! Usted puede ser:***

- Joven o Adulto.
- Hombre o Mujer.
- Homosexual o Heterosexual.
- Africano Americano, Blanco, Asiático, Hispano--a, o de cualquier raza.

***Diga: ¡Usted no puede saber si una persona tiene VIH solo con mirarla!***

***Diga: Usted no puede obtener VIH:***

- Por estar alrededor de alguien con SIDA.
- Por abrazar a alguien
- Al tocar a alguien

- Por besar
- De un estornudo o tos
- Por donar sangre

#### **¿Qué es SIDA?**

El Virus de la Inmunodeficiencia Humana (VIH) las causas Síndrome de Inmunodeficiencia Adquirida (SIDA).

VIH puede destruir la habilidad del cuerpo para luchar contra las infecciones y la enfermedad.

Es un problema grave de la salud en nuestra comunidad, en nuestro país y alrededor del mundo.

#### **¿Cómo es infectado alguien?**

VIH está en el semen, el líquido pre-eyaculador (pre-con), la sangre, vaginal líquido, y la leche materna. (Discernió en pequeñas cantidades en la saliva y lágrimas, pero no es fijo).

VIH es transmitido por actos sexuales como el trato oral, anal y vaginal, y compartiendo las agujas y otro equipo de inyección de droga (los "trabajo".)

VIH puede ser transmitido de la madre al niño durante el embarazo, el nacimiento, o el amamantamiento.

El virus no es transmitido por el contacto diario.

Usted no puede obtener VIH de ropas, de un teléfono, ni de un asiento de lavabo.

Usted no puede obtener VIH de un beso seco.

Usted no puede obtener VIH de una picadura de mosquito ni otro insecto muerde.

#### **¿Qué conducta le pone en riesgo?**

Compartir las agujas y jeringa.

Compartir las cocinas, el algodón, y agua de aclarado.

El sexo impropio, vaginal, oral o anal con cualquiera que es infectado con VIH.

Usted aumenta sus oportunidades de VIH contratante si usted tiene el sexo impropio con una persona que: entró en conductas de alto riesgo, tiene múltiples a socios de sexo, inyectan las drogas.

El alcohol y/o las drogas pueden aumentar las inhibiciones sexuales del estímulo y la disminución.

## *Resumen*

## Preguntas de resumen

*Diga: Por favor responda a estas preguntas, falso o verdadero*

1. El SIDA es una condición médica en la cual el cuerpo no puede combatir la enfermedad. **V**
2. El SIDA es causado por un virus. **V**
3. El Sida es una enfermedad la cual solo es contagiada por personas homosexuales. **F**
4. Lo que una persona come le puede causar SIDA. **F**
5. Si una madre tiene SIDA, hay riesgo de que el bebe puede estar infectado. **V**
6. Utilizando un condón durante las relaciones sexuales se puede disminuir el riesgo de transmisión del SIDA. **V**
7. La gente que esta diagnosticada con SIDA tiene otras enfermedades como resultado de tener SIDA. **V**
8. El SIDA es causado por el mismo virus que causa las enfermedades de transmisión sexual. **F**
9. No hay cura para el SID. **V**
10. La gente puede evitar contagiarse con SIDA si hace ejercicio a menudo. **F**
11. Si una persona toca a otra persona con SIDA esta se puede contagiar. **F**
12. El SIDA se puede contagiar utilizando el cepillo del pelo de una persona con SIDA. **F**
13. Las personas se pueden contagiar con el virus del VIH por una picadura de mosquito. **F**
14. Un examen negativo de VIH significa que la persona no está infectada con el virus. **F**

15. Un bebe puede contagiarse con HIV por medio de la leche materna de su madre .**V**
16. Las personas se pueden contagiar con el virus del VIH si tienen sexo anal sin protección.  
**V**
17. Una persona que es HIV positivo puede no presentar síntomas. **V**
18. El virus del SIDA puede estar presente en la sangre y fluidos sexuales. **V**
19. A una persona que tiene SIDA, se le nota la enfermedad. **F**
20. Las personas que tienen sexo sin protección con una persona que tiene muchos compañeros sexuales tiene más riesgo de contraer el virus del SIDA. **V**
21. Cuando una persona utiliza drogas es muy fácil que se le olvide tener sexo seguro. **V**
22. Es posible que un resultado del examen para detectar el VIH salga negativo y la persona este contagiada con la enfermedad. **V**

## **Bibliografía**

- UNAIDS (2009) '2009 AIDS epidemicupdate
- UNAIDS (2008) 'Report on the global AIDS epidemic
- USA QuickFacts, U.S. Census Bureau. Consultada el 15 de junio del 2009.
- Hall I, Song R, Rhodes P, Prejean J, An Q, Lee L.M, et al. [Estimation of HIV Incidence in the United States. \*JAMA\* 2008; 300: 520-529.](#)

- WISQARS [Web-based Injury 1. Statistics Query and Reporting System] leading causes of death reports, 2006. Accessed June 12, 2009.
- CDC. *HIV/AIDS Surveillance Report, 2007*. vol. 19. Atlanta: U.S. Department of Health and Human Services, CDC; 2009: 1-63. Accessed June 12, 2009.
- Pan-American Health Organization Regional Office of the World Health Organization: Women, Health and Development Program. *The UNGASS, Gender and Women's Vulnerability to HIV/AIDS in Latin America and the Caribbean* 2004. Accessed June 12, 2009.
- Diaz R, Ayala G, National Gay and Lesbian Task Force Report: Social Discrimination and Health, the Case of Latino Gay Men and HIV Risk. *The Policy Institute of the National Gay and Lesbian Task Force*. 2001.
- Leigh BS, Stall R. Substance use and risky sexual behavior to HIV: issues in methodology, interpretation, and prevention. *American Psychologist* 1993;48:1035-1045
- CDC. *Sexually Transmitted Disease Surveillance, 2007*. Atlanta, GA: U.S. Department of Health and Human Services; CDC; 2008. Accessed June 12, 2009.
- Shedlin MG, Decena CU, Oliver-Velez D. Initial acculturation and HIV risk among new Hispanic immigrants. *Journal of the National Medical Association* 2005; 97 (7) (suppl):32S-37S.

## MODULO 4 INVESTIGACION CUALITATIVA

**Introducción:** Informar a los participantes acerca de la investigación cualitativa.

**Objetivos:** Entender los diferentes pasos de la investigación cualitativa.

**Diga:** Durante esta presentación vamos a aprender temas relacionados con la Investigación Cualitativa

**Los temas a tratar son:**

1. ¿Cuál es la definición de la investigación cualitativa?
2. ¿Qué es investigación cualitativa?
3. ¿Porque es importante la investigación cualitativa?
4. ¿Cuáles son las diferencias entre la investigación cualitativa y cuantitativa?
5. ¿Cuáles son las similitudes entre la investigación cualitativa y cuantitativa?
6. ¿Cuál es el papel del investigador en la investigación cualitativa?
7. ¿Cómo es el proceso de la investigación cualitativa?
8. ¿Cuáles son los principales métodos de la investigación cualitativa?

### Investigación Cualitativa

**Pregunta:** ¿Cual es la definición de la investigación cualitativa?

**Diga:** Es una investigación más detallada ya que se desarrolla a partir de observaciones, entrevistas, narraciones, notas de campo, grabaciones de audio y vídeo, fotografías y películas.

**Pregunta: ¿Qué es Investigación Cualitativa?**

**Diga:**

- f Es aquella en la cual los datos se obtienen de forma verbal o visual.
- f Los datos no se colectan en forma numérica.
- f Se interesa en lo que piensan los participantes.
- f Logra un entendimiento a fondo de los problemas de interés en una comunidad.
- f Obtiene datos detallados de lo que está sucediendo en una población.

**Pregunta: ¿Por qué es importante la investigación Cualitativa?**

**Diga:**

- f Se interesa en saber cómo ocurren los problemas desde el punto de vista de la comunidad.
- f Complementa a la investigación cuantitativa ya que busca información de forma más detallada.

**Pregunta: ¿Cuales son las diferencias entre la investigación cualitativa y la cuantitativa?**

- f La investigación cualitativa se realiza por medio de palabras o imágenes

# HOUSE

f La investigación cuantitativa se realiza con números

***Ejemplo: Pregunta de investigación cualitativa***

“Por favor escriba sus comentarios sobre la utilización de los condones”

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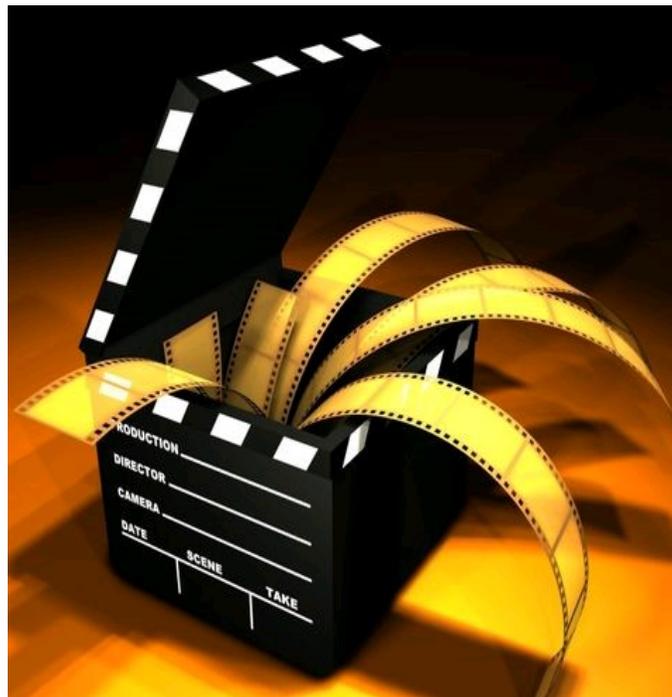
***Ejemplo: Pregunta de Investigación Cuantitativa***



Estos comentarios se pueden codificar en forma numérica.

1. Comentarios positivos
2. Comentarios Negativos
3. Comentarios Neutrales

## VIDEO Y ACTIVIDAD



## Preguntas sobre el video:

### Preguntas Cuantitativas:

1. ¿Fue este video sobre animales interesante?

1	2	3
No estoy de acuerdo	Neutral	De acuerdo

2. ¿Este comportamiento entre los animales es común en los lugares donde ellos viven?

1	2	3
Muy frecuente	Poco frecuente	No es frecuente

3. ¿Planea usted conversar sobre este video con otras personas?

1	2	3
Definitivamente si	Aun no lo sé	No



**Diga:** Ahora vamos a continuar con la investigación cualitativa

**Pregunta:** ¿Cual es el papel del Investigador en la Investigación Cualitativa?

- f* Se interesa por entender a las demás personas.
- f* Aprende de los participantes.
- f* Les da a los participantes información sobre el estudio que se va a realizar.
- f* Crea un ambiente de confianza dentro de la investigación.

**Pregunta:** ¿Como es el proceso de la investigación Cualitativa?

- f* Identificar el problema a investigar.
- f* Búsqueda de información del tema a investigar.
- f* Identificación de los participantes.
- f* Colección de los datos.
- f* Análisis de los datos.
- f* Conclusiones de los datos obtenidos.

**Diga:** Identificar el problema a investigar

- f* Es importante determinar que se quiere investigar.
- f* Identificar que temas son importantes.

**Diga:** Búsqueda de información del tema a investigar

- f* Se utiliza para obtener información relacionada con el tema que se quiere investigar.
- f* La revisión se hace buscando en libros, revistas y en internet.



### ***Diga: Identificación de los participantes***

- f* Es importante analizar la población que se quiere estudiar, para después seleccionar los participantes que van a hacer parte de la investigación.
- f* No todas las personas de la población cumplen con los requisitos del estudio o quieren ser parte de este.

### ***Diga: Colección de los datos***

Los datos en la investigación cualitativa se colectan por medio de métodos tales como:

- f* Observación participativa
- f* Entrevistas etnográficas
- f* Grupos focales

### ***Diga: Observación Participativa***

- f* Es la observación detallada de lugares y situaciones relacionadas con la investigación.

### ***Pregunta: ¿Cual es el papel del investigador durante la observación participativa?***

#### ***Diga:***

- f* Observa cuidadosamente y toma nota de todo lo que ocurre a su alrededor, como las características del grupo y los participantes.
- f* Se interesa en la rutina, del día a día de los participantes en la investigación. Ej. quiénes son, cómo viven ó trabajan, qué es importante para ellos, etc.
- f* Graba en detalle todas las situaciones.
- f* Tiene en cuenta los gestos de la gente; la comunicación no verbal.
- f* Toma notas de sus observaciones.

### **Ejercicio: Observación Participativa**

#### **Instrucciones:**

- f* **Salir afuera**
- f* **Hacer observación por 5 minutos**
- f* **Describir en detalle el mural que está pintado en frente del edificio de la asociación campesina**
- f* **Después vamos a compartir lo que encontramos**

**Diga:** Ahora vamos a continuar con la investigación cualitativa.

**Diga: Entrevistas Etnográficas**

- f* Se refieren a conversaciones y diálogos profundos sobre el tema de interés, con personas de la comunidad o el grupo de interés.

**Pregunta: ¿Cual es el papel del investigador en una entrevista etnográfica?**

- f* Hace preguntas abiertas relacionadas al tema de investigación.
- f* Graba conscientemente y en detalle todas las opiniones y reacciones del entrevistado.

**Diga: Los tipos de preguntas que se pueden hacer en una entrevista etnográfica son:**

- f* Preguntas demográficas (Ejemplo: edad, sexo, raza, nivel educativo, ingreso, estado civil, etc.)
- f* Preguntas de experiencia y comportamiento (Ejemplo: ¿Me puede describir cómo es un día de trabajo para usted? ¿Qué hace usted cuando sus hijos no le obedecen?)
- f* Preguntas de opinión y valores (Ejemplo: Qué opina usted sobre el contagio del VIH?)
- f* Preguntas de sentimientos (Ejemplo: ¿Cómo se ha sentido usted cuando ha estado desempleado?)
- f* Preguntas de conocimiento (Ejemplo: ¿Qué es el VIH?, ¿Qué es alcoholismo?)

## Ejercicio: Entrevista Etnográfica

### Instrucciones:

- f* **Hacer grupos de dos personas**
- f* **Uno será el entrevistador y el otro el entrevistado**
- f* **El entrevistador explicara el consentimiento informado**
- f* **El entrevistador le hará 2 preguntas al entrevistado y el entrevistado las contestara**
- f* **Una vez terminada la entrevista el entrevistador agradece al participante por permitir hacerle la entrevista**
- f* **Finalmente compartiremos la información con el resto del grupo**

**Tema: La gripa en los niños**

### Preguntas:

- 1. ¿Cuándo su hijo/a se enferma de la gripa como lo cura usted?**
- 2. ¿Qué hace usted cuando su hijo/a no se quiere tomar su medicina?**

*Diga:* Ahora vamos a continuar con la investigación cualitativa.

### *Diga:* Grupos Focales

- f* Un grupo focal es una conversación grupal facilitada por un investigador sobre el tema que se quiere investigar.
- f* La discusión depende de la interacción del grupo, y las preguntas que haga el investigador.
- f* Depende fuertemente de las habilidades del investigador.

### *Diga:* ¿Cual es el papel del investigador en los grupos focales?

- f* Ayuda al grupo a crear reglas básicas al comienzo (Ej. Permite a los participantes dar su opinión en forma ordenada.)
- f* Trata de que el tema a investigar este siempre presente durante la conversación.



### ***Diga: Diseño de un Grupo Focal***

- ¿Dónde se realiza?** *f* En espacios como oficinas de la comunidad, salas de conferencias en universidades, espacios públicos, al aire libre.
- ¿Quién lo compone?** *f* Un grupo de persona
- ¿Cuántas personas se necesitan?** *f* Es un Grupo de 6-10 personas
- ¿Duración del grupo focal?** *f* 1 a 2 horas generalmente.  
*f* Se debe planear una hora antes de comenzarlo.  
*f* Se pide a los participantes estar preparados para 2 horas si la discusión se extiende o se empieza más tarde.
- ¿Cuántas preguntas se realizan?** *f* De 4-5 preguntas

### ***Diga: Desarrollo del grupo focal***

- f* Se empieza con una pregunta fácil para romper el hielo y hacer que la conversación fluya.
- f* Se le pide a los participantes hablar uno en uno.
- f* Es importante mantener el tema de interés siempre durante toda la conversación.

- f* Las conversaciones son grabadas y escritas en papel para luego ser analizadas.

**Pregunta: ¿Cuales son las ventajas de un grupo focal?**

- f* Explora a fondo los temas de interés en una comunidad.
- f* Generan nuevas ideas de estudio.
- f* Se colectan diferentes puntos de vista entre los participantes.
- f* Ayuda a la reflexión personal de los participantes.

**Pregunta: ¿Cuales son las desventajas de un grupo focal?**

**Diga:**

- f* Algunos temas no pueden ser discutidos por cuestiones de confidencialidad.
- f* No se da información tan detallada de cada individuo como se hace en las entrevistas.
- f* Aunque genera nuevas ideas, puede callar a algunas personas que tengan ideas diferentes a la mayoría del grupo.

**Ejercicio: Grupo Focal**

**Instrucciones:**

- f* **Formar grupos de 5 personas**
- f* **Formar un circulo con las sillas y sentarse**
- f* **Juntos en grupo, formar reglas para llevar a cabo el grupo focal**
- f* **Una vez establecidas las reglas el facilitador empezara con el tema**
- f* **Empezara por hacer una pregunta fácil para romper el hielo y de esa manera los participantes podrán abrirse al tema de interés**

**Tema: Remedios para la cruda (día siguiente después de una borrachera)**

**Preguntas:**

1. ¿A ustedes les gustan las fiestas?
2. ¿Qué tipo de fiestas les gustan? (ej. Los bailes en clubs nocturnos, las fiestas de cumpleaños, o juntas sociales)
3. ¿Cuántas bebidas alcohólicas creen ustedes que son suficientes para que alguien amanezca crudo al día siguiente?
4. ¿Qué remedios conocen ustedes para el alivio de la cruda?

**Diga: Conclusiones de los datos obtenidos**

- f* Después de analizar los datos obtenidos, el investigador comienza la fase de interpretación.
- f* En esta fase se sacan conclusiones sobre toda la información que se colecto durante la investigación.

**Conclusiones**

- f* La investigación cualitativa es una investigación más detallada ya que se desarrolla a partir de observaciones, entrevistas, narraciones, notas de campo, grabaciones de audio y vídeo, fotografías y películas.
- f* La investigación cualitativa usa múltiples técnicas, como la observación participativa, la entrevista y los grupos focales.
- f* Los datos se colectan en forma numérica.
- f* Logra un entendimiento a fondo de los problemas de interés en una comunidad.

**Preguntas de repaso**

1. La investigación cualitativa se interesa en lo que piensan los participantes. **V**
2. Los datos en la investigación cualitativa se obtienen en forma de números. **F**

3. Las entrevistas etnográficas se refieren a conversaciones y diálogos profundos sobre el tema de interés. **V**
4. Un grupo focal no es una conversación grupal facilitada por un investigador. **F**
5. En la observación participativa se describe en detalle los lugares y situaciones relacionados con la investigación. **V**

## Referencias

- f* Glesne, Corrine (2006). *Becoming Qualitative Researchers: An Introduction*. Boston: Pearson Education, Inc.
- f* Vera Velez, L. (2004). *La Investigación Cualitativa*. [En línea]. Consultado: Junio 2010 en [http://ponce.inter.edu/cai/reserva/lvera/INVESTIGACION\\_CUALITATIVA.pdf](http://ponce.inter.edu/cai/reserva/lvera/INVESTIGACION_CUALITATIVA.pdf)
- f* Lanksher, C. y Knobel, M. (2000) Problemas Asociados con la Metodología de la Investigación Cualitativa. *Perfiles Educativos*, No. 87 (México – UNAM) [En Línea] Consultado: Junio 2010 en <http://www.cesu.unam.mx/iresie/revistas/perfiles/perfiles/87-html/Frm.htm>
- f* *Cualitativa*. *Perfiles Educativos*, No. 87 (México – UNAM) [online] Accessed: Junio 2010 en <http://www.cesu.unam.mx/iresie/revistas/perfiles/perfiles/87-html/Frm.htm>
- f* Trochim, W.M.K., *The Research Methods Knowledge Base : Qualitative validity*. Web center for social research methods. [online] Accessed: Julio, 2010 de <http://www.socialresearchmethods.net/kb/qualval.php>

## MODULO 5 INVESTIGACION CUANTITATIVA

**Introducción:** Informar a los participantes sobre la investigación cuantitativa.

**Diga:** Entender los diferentes pasos de la investigación cuantitativa.

**Diga:** Durante esta presentación vamos a aprender temas como:

- f* ¿Qué es la investigación?
- f* ¿Qué es la investigación cuantitativa?
- f* ¿Cuáles son los pasos de la investigación cuantitativa?

**Diga:** Vamos a comenzar primero por definir y entender que es la Investigación.

**Pregunta:** ¿Qué es la investigación?

**Diga:**

- f* Es la búsqueda de conocimientos.
- f* Averigua algo que se desconoce.

**Pregunta:** ¿Que es la Investigación Cuantitativa?

**Diga:**

- f* La investigación cuantitativa colecta los datos en forma de números.

**Pregunta:** ¿Cuales son los pasos que un investigador debe hacer para poder llevar con éxito una Investigación Cuantitativa?

1. Buscar la idea que se quiere investigar.
2. Identificar el problema que se quiere investigar.
3. Buscar información del tema a investigar y resumen de lo que se encuentra.
4. Escoger el tipo de estudio que se va a realizar.
5. Escribir la hipótesis
6. Identificar las variables
7. Mirar el tiempo en la investigación
8. Buscar la muestra
9. Recolección de datos
10. Análisis e interpretación de los resultados
11. Presentar los resultados

**Diga:** Ahora vamos a explicar y dar ejemplos de todos los pasos de la investigación cuantitativa

**Pregunta: 1. ¿Cómo se busca la idea que se quiere investigar?**

**Diga:** Se comienza por pensar que queremos estudiar

f Ejemplo: Vamos a investigar el VIH

**Ejercicio:**



f ¿Que otros temas podemos investigar?  
Pensemos en temas que les gustaría estudiar

Ej.: Depresión, Obesidad, etc.

**Pregunta: 2. ¿Como se identifica el problema que se quiere investigar y como se hace la pregunta de investigación?**

**Diga:**

- f De la idea que se quiere estudiar, se selecciona que problema se quiere investigar.
- f Luego se escribe la pregunta de investigación.

**Diga:** Ahora vamos a mostrar un ejemplo en donde se puede entender mejor la idea, el problema y la pregunta de investigación.

**Ejemplo:**

**Idea:** Queremos investigar el VIH

**Problema:** Vamos a ver cuál es la relación entre el alcohol, las drogas y el VIH.

**Diga:** Después de identificar la idea y el problema, pasamos a escribir la pregunta de investigación.

**Pregunta de investigación:** **¿Cuál es la relación entre el abuso de alcohol y drogas con comportamientos de riesgo relacionados con el contagio del VIH?**

**Diga:** Ahora Vamos a continuar con el siguiente paso en la investigación cuantitativa.

**Pregunta: 3. ¿Cómo se realiza la búsqueda del tema a investigar y como se hace el resumen de lo que se encontró?**

**Diga:**

La búsqueda del tema que se quiere estudiar se utiliza para obtener información relacionada con lo que queremos investigar.

Examinar artículos, revistas, y libros basados en el tema que nos interesa.

En Internet se puede buscar en:

[www.scholar.google.com](http://www.scholar.google.com)

[www.ncbi.nlm.nih.gov/pubmed](http://www.ncbi.nlm.nih.gov/pubmed)

[www.library.fiu.edu/](http://www.library.fiu.edu/)

**Diga:** Vamos a presentar un ejemplo en donde se puede entender cómo se busca la información del tema que se quiere investigar y como se hace el resumen de lo que se encuentra.

**Ejemplo:**

**Diga:** Basados en el ejemplo de la pregunta de investigación, vamos a sacar las palabras claves que nos van a ayudar a buscar la información.

**Pregunta de investigación:** ¿Cual es la relación entre el abuso de alcohol y drogas con comportamientos de riesgo relacionados con el contagio del VIH?

**Palabras claves:**

Alcohol

Drogas

VIH

Abuso de alcohol

Abuso de drogas

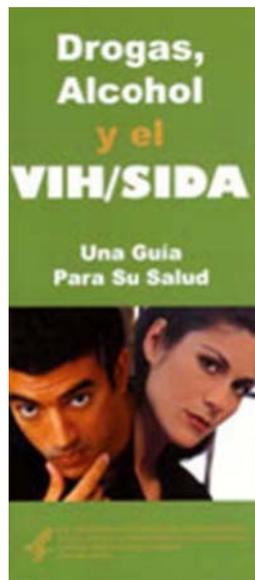
Comportamiento de riesgo

**Diga:** Las palabras claves se colocan en Google para encontrar información del tema que queremos investigar.

Las palabras claves de nuestro tema de investigación que se colocaron en Google fueron: Alcohol, drogas y VIH.



**Diga:** Una vez hemos encontrado los artículos en Google, pasamos a sacar los que más nos interesen para luego leerlos y hacer un resumen de ellos.



### **Ejemplo: Resumen de la “Relación entre el abuso del alcohol drogas y el VIH”**

Desde el comienzo de la epidemia se ha reconocido que existe una conexión entre el abuso de las drogas y el VIH/SIDA. Aunque el uso de drogas inyectables es bien conocido como un factor de riesgo en este aspecto, el papel que juega el abuso de las drogas no inyectables en la propagación del VIH es menos reconocido. Esta última conexión se debe en parte a los efectos adictivos e intoxicantes de muchas drogas, que pueden alterar el juicio y la inhibición, haciendo que muchas personas se involucren en comportamientos impulsivos y peligrosos.

Generalmente las personas relacionan el abuso de drogas y el VIH/SIDA con el uso de drogas inyectables y el uso compartido de agujas. Cuando los usuarios de drogas inyectables comparten el "equipo", tal como agujas, jeringas y otra parafernalia para la inyección de drogas, se puede transmitir el VIH entre los usuarios. Otras infecciones, como la hepatitis C, también se pueden transmitir de esta manera. La hepatitis C puede causar enfermedad hepática y lesión hepática permanente.

El abuso de drogas por medio de cualquier ruta (no solamente por inyección) puede poner a una persona en riesgo de contraer el VIH. La intoxicación por alcohol o drogas afecta el juicio y puede llevar a prácticas sexuales peligrosas, lo que pone a las personas en riesgo de contraer el VIH o de transmitírselo a otra persona.

El abuso de drogas y la adicción pueden afectar la salud general de una persona, alterando así la susceptibilidad al VIH y a la progresión del SIDA. Tanto el abuso de drogas como el VIH afectan el cerebro. Las investigaciones han demostrado que el VIH causa mayor daño en las células del cerebro y deterioro cognitivo entre los usuarios de metanfetamina que entre los pacientes con VIH que no usan drogas. En estudios con animales, la metanfetamina ha demostrado incrementar la cantidad del VIH en las células del cerebro. [\*]

Desde finales de la década de los ochenta, las investigaciones han demostrado que una manera eficaz de prevenir la transmisión del VIH es mediante el tratamiento para el abuso de las drogas. Los drogadictos que reciben tratamiento suspenden o reducen el uso de drogas y el comportamiento riesgoso relacionado, tal como la inyección de drogas y prácticas sexuales peligrosas. Además, los programas para el tratamiento del abuso de drogas juegan un papel importante en el suministro de información actualizada sobre el VIH/SIDA y enfermedades relacionadas, servicios de consejería y pruebas de detección, y referencias a servicios médicos y sociales.

**\* HIV Neurobehavioral Research Center Group. "Patterns of selective neuronal damage in methamphetamine-user AIDS patients" J Acquir Immune Defic Syndr. 2003 Dec 15;34(5):467**<http://www.ncbi.nlm.nih.gov/sites/entrez?Db=pubmed&Cmd=ShowDetailView&TermToSearch=14657756>

**Ejercicio:**

- f* Digan palabras claves de algo que les gustaría estudiar.
- f* Las vamos a colocar en Google y vamos a ver cuántos artículos encontramos.

**Diga:** Ahora vamos a continuar con el siguiente paso de la investigación cuantitativa.

**Pregunta: 4. ¿Cómo se escoge el tipo de estudio que se va a realizar?**

**Diga:** Hay tres tipos de estudios:

1. Los estudios que describen una situación
2. Los estudios que miran una relación
3. Los estudios que explican que está pasando

**Diga:**

- f* Los estudios que describen una situación: Describen que está pasando.

**Ejemplo:**

Descripción de la población Hispana con VIH en Miami

**Diga:**

- f* Los estudios que miran una relación: Este estudio busca una relación entre lo que está pasando.

**Ejemplo:**

La relación entre el consumo de drogas y los comportamientos de riesgo con respecto al contagio del virus del VIH.

**Diga:**

- f Los estudios que explican que está pasando: buscan explicar por qué ocurren las cosas.

**Ejemplo:**

Estudio de la relación entre el alcohol, las drogas y el VIH.

**Pregunta: 5. ¿Qué es una Hipótesis?**

**Diga:**

- f La Hipótesis es una posible respuesta a lo que puede ocurrir en el estudio.
- f Se escribe a partir de la pregunta que vamos a investigar.

**Pregunta: ¿Cómo se escribe la Hipótesis?**

**Diga:**

“Si \_\_\_\_ [Yo hago esto] \_\_\_\_, entonces \_\_\_\_ [esto] \_\_\_\_ puede ocurrir.”

**Diga:** Las diferentes clases de Hipótesis

**Diga:**

- f Hipótesis Alternativa
- f Hipótesis Nula

**Diga:**

*f* Hipótesis Alternativa: Esta hipótesis dice que va a haber un relación entre lo que estamos estudiando.

Pregunta de investigación: ¿Cuál es la relación entre el abuso de alcohol y drogas con comportamientos de riesgo relacionados con el contagio de VIH?

***Ejemplo de hipótesis alternativa basada en la pregunta de investigación:***

Las personas que abusan del alcohol son más propensas a practicar comportamientos de riesgo relacionadas con el contagio del virus del VIH.

*f* Hipótesis Nula: Esta Hipótesis dice que no existen una relación entre lo que estamos estudiando.

Pregunta de investigación: ¿Cuál es la relación entre el abuso de alcohol y drogas con comportamientos de riesgo relacionados con el contagio de VIH?

***Ejemplo de hipótesis nula basada en la pregunta de investigación:***

No existe una relación entre el abuso de alcohol y los comportamientos de riesgo relacionados con el contagio del virus del VIH.

***Pregunta: 6. ¿Qué son las Variables?***

**Diga:**

*f* Son características de algo que se observa.

***Ejemplo de variables:***

*f* Frecuencia de consumo de alcohol

*f* Drogas que ha consumido en los últimos 30 días

***Pregunta: ¿Cuales son los tipos de variables?***

***Diga:*** Las variables se dividen en:

- f* Variable Dependiente
- f* Variable Independiente

Variable Dependiente:

- f* Es la variable más importante en el estudio.
- f* Es afectada por la variable independiente.

Basados en la pregunta de investigación: ¿Cuál es la relación entre el abuso de alcohol y drogas con comportamientos de riesgo relacionados con el contagio de VIH?

***Ejemplo de variable dependiente:***

Contagio del virus del VIH

Variable Independiente:

- f* Es la variable que afecta a la variable dependiente.

Basados en la pregunta de investigación: ¿Cuál es la relación entre el abuso de alcohol y drogas con comportamientos de riesgo relacionados con el contagio de VIH?

***Ejemplo de variables independientes:***

- f* Alcohol
- f* Drogas

***Ejemplo de variables basados en nuestra pregunta de investigación:***

**Pregunta de investigación:** ¿Cuál es la relación entre el abuso de alcohol y drogas con comportamientos de riesgo relacionados con el contagio de VIH?

Al aumentar el consumo de alcohol y drogas, aumenta el riesgo de contagio con el virus del VIH.

- f* Alcohol y Drogas: son las variables independientes ya que explican lo que puede ocurrir con la variable dependiente.
- f* Riesgo de contagio con VIH: Es la variable dependiente, ya que es afectada por la variable independiente.

**Pregunta: 7.** ¿Cómo se maneja el tiempo en una investigación?

**Diga:** Un estudio se puede realizar de forma:

Transversal o Longitudinal

- f* Transversal: Durante la investigación, la información se colecta solo una vez.



- f* Longitudinal:

Durante la investigación la información se colecta en diferentes periodos de tiempo.

ENERO							FEBRERO							MARZO						
L	M	X	J	V	S	D	L	M	X	J	V	S	D	L	M	X	J	V	S	D
						1			1	2	3	4	5			1	2	3	4	5
2	3	4	5	6	7	8	6	7	8	9	10	11	12	6	7	8	9	10	11	12
9	10	11	12	13	14	15	13	14	15	16	17	18	19	13	14	15	16	17	18	19
16	17	18	19	20	21	22	20	21	22	23	24	25	26	20	21	22	23	24	25	26
23	24	25	26	27	28	29	27	28						27	28	29	30	31		
30	31																			

ABRIL							MAYO							JUNIO						
L	M	X	J	V	S	D	L	M	X	J	V	S	D	L	M	X	J	V	S	D
					1	2	1	2	3	4	5	6	7				1	2	3	4
3	4	5	6	7	8	9	8	9	10	11	12	13	14	5	6	7	8	9	10	11
10	11	12	13	14	15	16	15	16	17	18	19	20	21	12	13	14	15	16	17	18
17	18	19	20	21	22	23	22	23	24	25	26	27	28	19	20	21	22	23	24	25
24	25	26	27	28	29	30	29	30	31					26	27	28	29	30		
31																				

JULIO							AGOSTO							SEPTIEMBRE						
L	M	X	J	V	S	D	L	M	X	J	V	S	D	L	M	X	J	V	S	D
					1	2	1	2	3	4	5	6				1	2	3		
3	4	5	6	7	8	9	7	8	9	10	11	12	13	4	5	6	7	8	9	10
10	11	12	13	14	15	16	14	15	16	17	18	19	20	11	12	13	14	15	16	17
17	18	19	20	21	22	23	21	22	23	24	25	26	27	18	19	20	21	22	23	24
24	25	26	27	28	29	30	28	29	30	31				25	26	27	28	29	30	
31																				

OCTUBRE							NOVIEMBRE							DICIEMBRE						
L	M	X	J	V	S	D	L	M	X	J	V	S	D	L	M	X	J	V	S	D
						1			1	2	3	4	5				1	2	3	
2	3	4	5	6	7	8	6	7	8	9	10	11	12	4	5	6	7	8	9	10
9	10	11	12	13	14	15	13	14	15	16	17	18	19	11	12	13	14	15	16	17
16	17	18	19	20	21	22	20	21	22	23	24	25	26	18	19	20	21	22	23	24
23	24	25	26	27	28	29	27	28	29	30				25	26	27	28	29	30	31
30	31																			

**Diga: 9. Selección de la muestra**

**Pregunta: ¿Que es la población?**

**Diga:**

- f Es la totalidad de un grupo.
- f De este grupo se saca una muestra para estudiarla.

**Ejemplo:** La comunidad Hispana en los Estados Unidos

**Pregunta: ¿Que es la Muestra?**

**Diga:**

- f Es un grupo de la población que se quiere estudiar.
- f **Ejemplo:** Los Hispanos del área de Homestead.

***Pregunta: ¿Cómo se selecciona la muestra en una investigación?***

- f* Primero se busca la población que se quiere estudiar.
- f* De esta población se saca un grupo de personas para estudiarlas.

***Pregunta: ¿Por qué es importante tener una buena muestra?***

- f* Es muy difícil estudiar a toda la población, por eso se saca un pequeño grupo para poderla estudiar.
- f* Este grupo debe tener las mismas características de la población de la cual se sacó el grupo.

***Pregunta: 9. ¿Cómo se realiza la recolección de los datos en la investigación cuantitativa?***

***Diga:***

- f* Los datos en una Investigación Cuantitativa se obtienen por medio de un cuestionario.

***Pregunta: ¿Que es un Cuestionario?***

***Diga:*** Se utiliza para que el participante del estudio responda a preguntas del tema que se va a estudiar.

Anexo 1

Cuestionario individual anónimo

Centro

Localidad

Curso: ESO, Ciclos formativos, BUP, Otros

Hombre

Mujer

Edad

A las siguientes propuestas conteste verdadero, falso, o no lo sé

A.- Una persona portadora del virus del SIDA puede tener un aspecto totalmente sano.

B.- El SIDA es cosa de drogadictos y homosexuales.

C.- La persona portadora del virus del SIDA se le nota enseguida.

D.- El virus del SIDA se puede transmitir a través del aire (tos, etc.).

E.- Desde hace un año hay una medicina que cura el SIDA.

F.- Existe alguna forma de saber si una persona tiene el SIDA.

G.- Por las relaciones sexuales se puede transmitir el virus del SIDA.

H.- Los insectos pueden transmitir el virus del SIDA.

I.- Haciendo deporte con personas portadoras del virus del SIDA o usando su ropa o toallas, hay riesgo de coger la enfermedad.

J.- Si a una persona se le hace una transfusión de sangre en nuestro país, hay riesgo de coger la enfermedad

K.- Tendría inconveniente en estar en clase con una compañera/o con SIDA.

L.- Si entre mi grupo, un compañero tuviese el SIDA, cambiaría mi relación por este motivo.

M.- Tendría miedo de contagiarme si viviese con un familiar/persona enfermo de SIDA

Para evitar contagios Es útil:

N1.- Utilizar el preservativo cuando haga falta.

N2.- No dar sangre.

N3.- Bañarse con agua muy caliente.

N4.- Evitar la droga y el uso compartido de agujas o jeringas

N5.- No mantener relaciones sexuales.

N6.- Hacer ejercicio.

**Pregunta: ¿Cómo se diseña un Cuestionario?**

**Diga:** El cuestionario:

- f* Debe tener un título.
- f* Debe tener instrucciones breves.
- f* Hay que enumerar las preguntas.
- f* Es importante agrupar las preguntas en secciones.

**Pregunta: ¿Que se debe tener en cuenta cuando se realiza un cuestionario?**

**Diga:**

- f* Al principio del cuestionario es importante preguntar los datos como sexo, edad y ocupación.



***Diga:***

Respuesta Si o No

***Ejemplo:***

1. ¿Usted tiene un trabajo?

Si            No

2. ¿Usted está casado?

Si            No

3. ¿Usted tiene niños?

Si            No

***Diga:***

Respuesta de opción única

***Ejemplo:***

¿Para evitar el contagio del VIH es importante? (Por favor escoja solo una respuesta)

- A. Utilizar un preservativo
- B. No dar sangre
- C. Tener relaciones con múltiples compañeros
- D. Hacer ejercicio

***Diga:***

Respuesta falso o verdadero

***Ejemplo:***

¿El uso del condón previene el contagio del VIH?

Falso o Verdadero

**Diga:**

Respuesta opción múltiple

**Ejemplo:**

¿Cómo se puede contagiar una persona con VIH? (Por favor escoja todas las que apliquen)

- A. Teniendo relaciones sexuales con varios compañeros.
- B. Inyectándose droga con agujas utilizadas por otras personas.
- C. No utilizando un condón.
- D. Compartiendo la comida con otra persona.

**Ejercicio:**

- f* Vamos a realizar un pequeño cuestionario.
- f* Entre todos vamos a seleccionar un tema.
- f* Después de seleccionarlo, vamos a comenzar a hacer un pequeño cuestionario de 10 preguntas.
- f* El cuestionario se va a realizar teniendo en cuenta la guía de cómo desarrollar un cuestionario.

**Diga:** Vamos a continuar con el siguiente paso de la investigación cuantitativa

**Diga: 11. ¿Cómo se analizan y se interpretan los datos?**

- f* La recolección de la información se hace por medio de preguntas en los cuestionarios.
- f* Las preguntas que los participantes responden, quedan guardadas para luego ser analizadas.

- f Una vez se termina la recolección de la información y el análisis se comienzan a interpretar los datos obtenidos.
- f Por medio de la interpretación de los resultados se contesta la pregunta de investigación.

**TABLA 1. Respuestas de 10 pacientes (P1-P10) a 4 ítems (I4) sobre el dolor**

	I1	I2	I3	I4	Suma	Puntuación 0-100
P1	1	1	1	1	4	100
P2	0	1	1	1	3	75
P3	1	1	1	1	4	100
P4	1	1	0	1	3	75
P5	0	0	0	0	0	0
P6	1	0	1	0	2	50
P7	1	1	0	0	2	50
P8	1	0	1	1	3	75
P9	1	1	1	1	4	100
P10	0	1	0	0	1	25
<i>Ítems</i>						
I1. Tengo dolor por las noches					Sí	No
I2. Tengo dolor al subir y bajar escaleras					Sí	No
I3. Tengo dolor al cambiar de postura					Sí	No
I4. Tengo dolor al caminar					Sí	No

**Ejemplo:**

**Diga:**

- f Se realizó un cuestionario sobre el dolor
- f Se realizaron 4 preguntas
- f Cada pregunta estaba numerada del 1 al 4

Las preguntas fueron:

1. Tengo dolor por las noches
2. Tengo dolor al subir y bajar escaleras

3. Tengo dolor al cambiar de postura
4. Tengo dolor al caminar

- f* Las preguntas se le suministraron a 10 participantes
- f* El formato de respuesta de cada pregunta era SI o NO
- f* A la respuesta SI se le asigno el numero 1
- f* A la respuesta NO se le asigno el numero 2

***Diga:***

- f* Al observar la tabla se ve en la primera line el número del participante.
- f* En las líneas siguientes se observa el numero de cada pregunta
- f* Al observar detalladamente, se pueden ver las respuestas de cada uno de los participantes.
- f* El participante N.1 contesto SI a la primera, segunda, tercera y cuarta pregunta.
- f* El participante N.2 contesto NO a la primera y SI a la segunda, tercera y cuarta pregunta.

***Diga: Basados en la tabal anterior se puede***

- f* Analizar los resultados del participante N.1, se observa que contesto SI a todas las preguntas relacionadas con dolor, con esto se llega a la conclusión de que este participante tiene problemas de dolor.
- f* Analizar los resultados del participante N. 2 se observa que contestó NO a todas las preguntas relacionadas con dolor, con esto se llega a la conclusión de que este participante no tiene problemas relacionados con dolor.

***Diga:*** De esta forma es como se analizan los resultados y se llegan a conclusiones.

***Pregunta: 11. ¿Cómo se presentan los resultados?***

***Diga:***

El informe final:

Es una presentación resumida del proceso de la investigación, que empieza desde la pregunta inicial pasando por las distintas etapas hasta llegar a responder a la pregunta del estudio.



### *Conclusiones:*

- f* La investigación es la búsqueda de conocimiento.
- f* La investigación cuantitativa se enfoca en recoger los datos en forma numérica para luego llegar a una conclusión.
- f* Los pasos de la investigación cuantitativa son:
  1. Buscar la idea que se quiere investigar.
  2. Identificar el problema que se quiere investigar.
  3. Buscar información del tema a investigar y resumen de lo que se encuentra.
  4. Escoger el tipo de estudio que se va a realizar.
  5. Escribir la hipótesis
  6. Identificar las variables
  7. Mirar el tiempo en la investigación
  8. Buscar la muestra
  9. Recolección de datos
  10. Análisis e Interpretación de los resultados
  11. Presentar los resultados

### *Preguntas de repaso*

1. ¿Durante una investigación se busca algo que se desconoce? **V**
2. ¿La investigación cuantitativa colecta información en forma de números? **V**
3. ¿La Hipótesis es uno de los pasos de la investigación cuantitativa? **V**
4. ¿La pregunta de investigación está relacionada con el tema que queremos investigar? **V**
5. ¿La muestra constituye la totalidad del grupo? **F**
6. ¿El informe final es una presentación resumida del proceso de la investigación? **V**

### *Bibliografía:*

- f* Heineman, K. Introducción a la metodología de la investigación empírica. 2003
- f* Sarantakos, 1998
- f* Eladio Zacarías Ortiz. Así se Investiga, Pasos para hacer una Investigación. Clásicos Roxsil. 2000. ISBN 84-89899-30-4
- f* Álvarez Cáceres R. El método científico en las ciencias de la salud. Las bases de la investigación biomédica. Madrid: Díaz de Santos, 1996.
- f* Calero JL. Investigación cualitativa y cuantitativa. Problemas no resueltos en los debates actuales. Rev. Cubana Endocrinol 2000; 11 (3): 192-8. [Texto completo - PDF]
- f* Abdellah FG, Levine E. Preparing Nursing Research for the 21 st Century. Evolution. Methodologies, Chalgés. Springer: New York; 1994.
- f* Strauss AL. Qualitative analysis for social scientifics. New York: Cambridge University press, 1987.
- f* Cabrero García L, Richart Martínez M. El debate investigación cualitativa frente a investigación cuantitativa Enfermería clínica, 1996; 6: 212-217. [Texto completo - PDF]

## MODULE 6 SALUD ORAL

### *Introducción:*

En este modulo se aprenderá información relacionada con la salud de la boca.

### *Objetivos:*

- f* Entender por que es importante la salud de la boca.
- f* Entender la relación que pueden tener los problemas de la boca con otras partes del cuerpo.
- f* Aprender cuales son los problemas más comunes que puede tener en la boca.
- f* Aprender medidas simples y fáciles para tener una boca saludable.

### *Ejercicio:*

***Pregunta:*** ¿Para ustedes es la salud de su boca importante?

***Respuesta:*** La salud de la boca es importante para tener una buena salud en todo su cuerpo.

### *Diga:*

Durante este modulo vamos a tratar temas como:

¿Qué es la boca?

¿Cómo están relacionados los problemas de su boca con problemas en otras partes de su cuerpo?

¿Cuáles son los problemas más comunes en su boca?

¿Qué es la Caries?

¿Qué es la enfermedad de las encías?

¿Qué otros problemas puede tener en la boca?

¿Qué medidas simples y fáciles puedo tomar para tener una boca saludable?

**Pregunta: ¿Qué es la boca?**

**Diga:**

La boca es una parte del cuerpo compuesta por los dientes, las encías y los tejidos que la soportan. La salud de su boca es importante para vivir mejor. Las partes que conforman su boca le permiten hablar, sonreír, suspirar, besar, oler, masticar, tragar y llorar. También le permiten expresar emociones. Al cuidar bien su boca se pueden prevenir enfermedades en todo el cuerpo.

**Pregunta: ¿Cómo están relacionados los problemas de su boca con problemas en otras partes de su cuerpo?**

**Diga:**

La salud de su boca puede ser un indicio sobre su salud en general. Muchas enfermedades graves, tales como la diabetes, el VIH y algunos trastornos alimenticios, muestran sus primeras señales en forma de síntomas en la boca. Es por eso que es importante examinarse la boca en forma regular.

La mayor parte de nosotros piensa en los problemas de la boca en forma de caries, dolores de dientes y dientes torcidos o manchados. Los problemas en nuestra boca también afectan la salud de nuestro cuerpo.

**Por ejemplo:**

- f* Si le faltan dientes, esto puede afectar su salud mental, ya que puede hacer que usted se sienta mal consigo mismo.
- f* Si padece diabetes, puede que tenga más posibilidades de padecer enfermedades en sus encías y por lo tanto aflojamiento y caída de sus dientes.
- f* Si tiene problemas en su corazón, es importante cuidar de su boca para no empeorar su enfermedad.

**Pregunta: ¿Cuáles son los problemas más comunes en su boca? Diga:**

Los problemas más comunes son las caries y las enfermedades de las encías.

**Pregunta: ¿Que es la Caries?**

Todos estamos en riesgo de tener caries a lo largo de nuestra vida.

**Así es como sucede:**

Es natural que usted tenga gérmenes en la boca. Los gérmenes se mezclan con la saliva y



pequeños trozos de comida en su boca para formar una capa de placa que se adhiere a sus dientes. La placa contiene ácidos que desgastan sus dientes. Estos ácidos pueden penetrar dentro de los dientes y crear huecos, o caries, en los mismos.

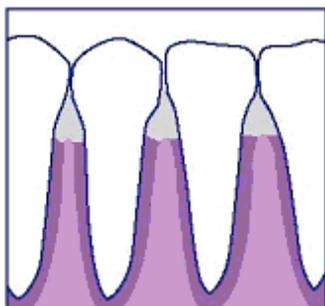
**Pregunta: ¿Que es la enfermedad de las encías?**

**Diga:**

La enfermedad de las encías es causada por infecciones o placa alrededor de sus dientes, y es una causa de pérdida de dientes si no es tratada a tiempo.

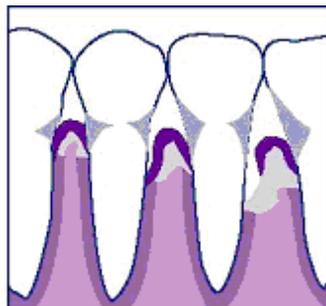
Esta enfermedad es causada por gérmenes de la boca. Usted tiene mayores probabilidades de que se infecte con estos gérmenes si:

- Es fumador/a
- Padece una enfermedad tal como la diabetes o el VIH



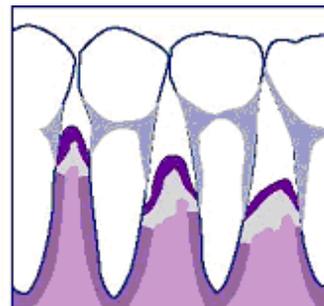
**Encías normales y sanas**

Las encías y los huesos sanos sujetan a los dientes firmemente en su lugar.



**Enfermedad de la encías**

Al no ser quitada, la placa se endurece formando sarro. A medida que la placa y el sarro continúan acumulándose, las encías comienzan a alejarse de los dientes, y se forman bolsas entre los dientes y las encías.



**Enfermedad de las encías avanzada**

Las encías retroceden aún más, destruyendo más el hueso. Los dientes aunque estén sanos, pueden aflojarse y tener que ser sacados.

## ***Pregunta: ¿Qué otros problemas puede tener en la boca?***

***Diga:***

### ***Ampollas (Fuegos):***

Estas ampollas son muy contagiosas y suelen formarse en los labios. Las ampollas tardan entre 7 a 10 días en sanar. Hay medicamentos que puede comprar en la farmacia y aplicar sobre la ampolla para aliviar el dolor.

### ***Aftas (Heridas en la boca):***

Estas ampollas aparecen dentro de la boca en forma de úlceras de base blanca o gris y borde rojo. Las aftas suelen ser pequeñas y suelen curarse solas en 1 a 3 semanas. Evitar los alimentos picantes puede aliviar el dolor. También puede ser beneficioso usar enjuagues bucales o agua salada para aliviar el dolor.

### ***Infecciones orales por hongos:***

Estas infecciones aparecen como lesiones rojas o blancas en la boca, planas o ligeramente alzadas. Son comunes en las personas que usan dentaduras postizas y ocurren más frecuentemente en personas de edad avanzada. Estas infecciones pueden prevenirse con una buena higiene oral. Si usa dentaduras postizas, lávelas y quíteselas cuando se va a dormir.

### ***Síndrome de la boca seca:***

Esto es común en muchos adultos, especialmente a medida que envejecen. Puede hacer más difícil comer, tragar, y hablar. Sucede cuando las glándulas salivales dejan de funcionar correctamente. Si no se trata, puede causar caries, ya que la saliva ayuda a limpiar a la boca de pequeños trozos de comida y también ayuda a evitar que el ácido forme placa sobre sus dientes.

### ***Cáncer oral:***

Este tipo de cáncer ocurre con más frecuencia en personas mayores de edad. Los lugares más comunes en los que se desarrolla el cáncer oral son la lengua, los labios y el piso de la boca. El uso de tabaco, especialmente combinado con el alcohol, es la causa principal de este tipo de cáncer. El cáncer oral suele comenzar en forma de una mancha o ampolla pequeña que no se nota, blanca o roja, en cualquier lugar de la boca.

Entre otras señales se encuentran:

- Una ampolla que sangra fácilmente o que no se cura

- Un cambio de color en su boca
- Dolor, sensibilidad en cualquier parte de la boca o en los labios
- Problemas para masticar, tragar, hablar o mover la lengua

***Pregunta: ¿Qué medidas simples y fáciles puedo tomar para tener una boca saludable?***

***1. Cepíllese los dientes por lo menos dos veces por día:***

Trate de hacerlo apenas se levanta en la mañana y antes de irse a dormir. Una vez por día, use hilo dental para limpiarse entre los dientes y quitar la comida que su cepillo no haya quitado.

***Asegúrese de:***

- Cepillarse suavemente todos los lados de sus dientes con un cepillo de cerdas blandas y pasta dentífrica con flúor. Los movimientos circulares y cortos hacia adelante y hacia atrás dan los mejores resultados.
  - Tómese el tiempo para cepillar a lo largo de las encías, y cepíllese suavemente la lengua para ayudar a quitar la placa y los restos de comida.
  - Cambie su cepillo de dientes por lo menos cada tres meses o antes si el mismo parece estar desgastado. Un cepillo dental nuevo puede quitar más placa que uno que tiene más de tres meses de uso.
  - Si usa dentaduras postizas, asegúrese de quitárselas en la noche y lavarlas antes de ponérselas nuevamente a la mañana siguiente.

***2. Tenga un estilo de vida saludable:***

- **Coma comidas saludables:** Estas disminuyen el deterioro de los dientes. Cepíllese los dientes luego de comer alimentos azucarados.
- **No fume:** Fumar aumenta el riesgo de padecer enfermedades de la boca, cáncer oral y de la garganta, e infecciones por hongos.

- **Si bebe alcohol:** Bébalo solamente en forma moderada. El consumo abundante de alcohol aumenta su riesgo de padecer cáncer oral y de la garganta. Cuando se consumen alcohol y tabaco juntos, su riesgo de padecer cáncer oral es aún mayor que cuando se consume uno de ellos por sí solo.

### *3. Vaya a revisarse regularmente:*

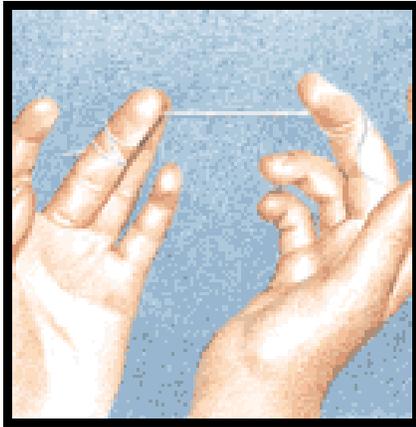
- Hacerse un examen oral dos veces por año ayudará a descubrir los indicios de los problemas en forma temprana. Durante las revisiones regulares, los dentistas u otros tipos de proveedores de atención dental pueden descubrir indicios de deficiencias nutricionales, enfermedades, infecciones, lesiones y algunos tipos de cáncer.
- Haga una cita de inmediato si sus encías sangran a menudo, si nota alguna mancha roja o blanca en sus encías o en su lengua, si sufre dolor en la boca o la mandíbula que no desaparece, si tiene ampollas que no se curan en dos semanas, o si tiene problemas para tragar o masticar.

### *4. Siga los consejos de su dentista:*

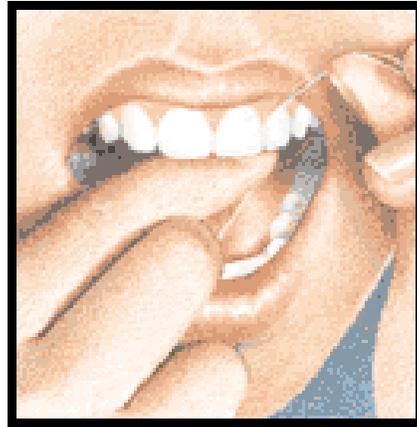
Puede que su dentista sugiera que usted haga distintas cosas para mantener su boca sana. Él o ella le puede enseñar cómo usar el hilo dental o cepillarse correctamente, y con qué frecuencia hacerlo. Él o ella pueden sugerir medidas preventivas o tratamientos para mantener su boca sana.

## Como Cepillarse los Dientes

## Como Utilizar el Hilo Dental



**1** Utilice de 30 a 45 centímetros de hilo dental y enrolle ambos extremos alrededor del dedo medio de cada mano.



**2** Sostenga el hilo dental fuertemente e introdúzcalo cuidadosamente entre cada diente. Luego, deslícelo de arriba hacia abajo sobre la superficie proximal del diente.

### *Conclusiones*

- f* Al cuidar su boca se pueden prevenir enfermedades en todo el cuerpo.
- f* Los problemas más comunes en su boca son las caries y las enfermedades de las encías.
- f* Es importante cepillarse los dientes por lo menos 2 veces al día.
- f* Es importante visitar al dentista 2 veces al año.
- f* Tomar alcohol y fumar puede aumentar el riesgo de padecer enfermedades de la boca.

### *Preguntas de repaso:*

1. Al cuidar bien su boca se pueden prevenir enfermedades en todo el cuerpo. **V**
2. Las comidas saludables aumentan el deterioro de los dientes. **F**
3. La salud de su boca puede ser un indicio sobre su salud en general. **V**
4. Los problemas en nuestra boca no afectan la salud de nuestro cuerpo. **F**
5. Es natural que usted tenga gérmenes en la boca. **V**
6. No es importante utilizar el hilo dental. **F**

### *Bibliografía*

- f* Division of Oral Health, NCCDPHP, CDC, OPHS, HHS  
Phone: (770) 488-6054  
Internet Address: <http://www.cdc.gov/OralHealth/index.htm>
- f* National Institute of Dental and Craniofacial Research (NIDR), NIH, HHS  
Phone: (301) 496-4261  
Internet Address: <http://www.nidr.nih.gov/>
- f* National Oral Health Information Clearinghouse (NOHIC), NIDR, NIH, HHS  
Phone: (301) 402-7364  
Internet Address: <http://www.nidcr.nih.gov/OralHealth/>
- f* American Academy of Pediatric Dentistry (AAPD)  
Phone: (312) 337-2169  
Internet Address: <http://www.aapd.org/>

*f* American Dental Association (ADA)

Phone number: (312) 440-2500

Internet address: <http://www.ada.org/>

*f* Academy of General Dentistry

Phone number: (888) 243-3368

Internet address: <http://www.agd.org/public/OralHealthFacts/>