

Toolkit on Translating and Adapting Instruments



April, 2005
Prepared by:

Ligia M. Chávez, Ph.D.
Behavioral Sciences Research Institute
Medical Sciences Campus, University of Puerto Rico

Glorisa Canino, Ph.D.
Department of Pediatrics and
Director Behavioral Sciences Research Institute,
Medical Sciences Campus,
University of Puerto Rico



Human Services Research Institute
2269 Massachusetts Avenue
Cambridge, MA 02140
www.tecathsri.org



U.S. DEPARTMENT OF HEALTH AND HUMAN SERVICES
Substance Abuse and Mental Health Services Administration
Center for Mental Health Services
www.samhsa.gov



This Toolkit is one of a series of such kits commissioned by the Evaluation Center@HSRI. The Center is supported by a cooperative agreement with the Center for Mental Health Services, Substance Abuse and Mental Health Services Administration. The mission of the Evaluation Center is to provide technical assistance related to the evaluation of adult mental health systems change.

The Center offers seven programs all of which are designed to enhance evaluation capacity. *The programs are:* the **Consultation Program**, which provides consultation tailored to the needs of individual projects; the **e-Community Program**, which provide a forum for ongoing dialogue via electronic conferencing; the **Toolkits & Materials Program**, which provides evaluators with tested methodologies, instruments and original papers on selected topics and identifies relevant literature in the field; the **e-Learning Program**, which supplies online courses and in-person training; the **Multicultural Program** that provides technical assistance with respect to evaluation of mental health services and systems for racially, ethnically and culturally diverse persons; the **Conferences Program** designed to inform our audience of events in which issues related to evaluation research are discussed; and the **Evidence-based Practices Program**, which assists in identifying evidence-based practices and moving promising interventions to evidence-based service.

The Toolkits are designed to provide evaluators with complete descriptions of methodologies and instruments for use in evaluating specific topics. Based on information from a needs assessment study conducted by the Center and on feedback from evaluators in the field, we have identified a number of important topics that evaluators are frequently interested in examining. Expert consultants have been engaged to review the background of these topics and to compile Toolkits that provide evaluators with state-of-the-art evaluation techniques to use in their own work.

The Evaluation Center@HSRI has also established an online Forum for discussing issues surrounding its Toolkits as well as other issues related to mental health service evaluation. This forum will provide an electronic venue for Toolkit users to share their expertise and experiences with the Toolkits. If you would like to participate in a user group, please visit and e-forum area of our website, www.tecathsri.org.

We hope that this Toolkit on Translation and Adapting Instruments will be helpful to those evaluators who are interested in methodological approaches to cross-cultural research and evaluation.

H. Stephen Leff, Ph.D.
Director

Virginia Mulkern, Ph.D.
Associate Director

Table of Contents

Acknowledgements	5
Overview	6
CHAPTER 1. Introduction	
<i>Conceptual Considerations</i>	7
CHAPTER 2. A Cultural Equivalency Model for Translating and Adapting Instruments	
<i>Semantic Equivalence</i>	11
<i>Content Equivalence</i>	13
<i>Technical Equivalence</i>	13
<i>Criterion Equivalence</i>	14
<i>Conceptual Equivalence</i>	14
CHAPTER 3 Steps for Translating and Adapting Instruments	
<i>Step 1 Original Instrument</i>	16
<i>Step 2 Translation by a Professional Translator</i>	16
<i>Step 3 Review of the translation by a Bilingual Committee</i>	16
<i>Step 4 Subsequent Review by a Multi-National Bilingual Committee (MNBC)</i>	16
<i>Step 5 Focus Group Discussions of the Translated Instrument</i>	17
<i>Step 6 Discussions of the Findings of Focus Groups by MNBC & Incorporation of Accepted Changes into the Translated Instrument</i>	18
<i>Step 7 Back-Translation of the Instrument</i>	18
<i>Step 8 Review of the Back-Translation by MNBC</i>	18
<i>Step 9 Test of Reliability and Validity of the Culturally Adapted Instrument</i>	19
<i>Step 10 Fine Tuning of the Culturally Adapted Instrument According to the Results of the Reliability and Validity Testing</i>	20
<i>Step 11 Final Adapted Version</i>	20
<i>Step 12 Feedback May Lead to Revisions in the Original Instrument</i>	20
CHAPTER 4 Examples From the Field: Translating and Adapting Instruments From English to Spanish	
<i>Field Examples - Semantic Equivalence</i>	22

<i>Field Examples - Content Equivalence</i>	23
<i>Field Examples - Technical Equivalence</i>	24
<i>Field Examples - Criterion Equivalence</i>	25
<i>Field Examples - Conceptual Equivalence</i>	25
CHAPTER 5 Conclusions and Recommendations.....	27
Bibliography	29
Appendices	
<i>Appendix A</i>	35
<i>Appendix B</i>	37
Appendix C	40
<i>Appendix C</i>	42
Appendix D.....	43
<i>Appendix E</i>	44
<i>Appendix F</i>	57

Acknowledgements

We would like to thank the team of translation researchers from the Behavioral Sciences Research Institute at the University of Puerto Rico that have collaborated in numerous articles and publications in previous years related to this topic, with a special appreciation to Dr. Milagros Bravo.

Overview

Purpose of Toolkit

The purpose of this toolkit is to provide a step by step guide on the translation and adaptation of an instrument, using the latest standards for methodological approaches in cross-cultural research, in order to achieve cultural equivalency. Researchers and evaluators will be made aware of the conceptual and methodological challenges involved in translating and adapting instruments, and will be provided with guidelines and suggestions throughout the process. **Chapter 1** describes cultural considerations in studying ethnic minorities, the need for culturally sensitive research, and the emic-etic paradigm for cross-cultural studies. **Chapter 2** describes a cultural equivalency model for translating and adapting instruments. **Chapter 3** provides researchers and evaluators with the concrete steps for translating and adapting instruments. In **Chapter 4** we provide examples from the field on translating and adapting instruments from English to Spanish. Finally, conclusions and recommendations can be found in **Chapter 5**. The Appendices give additional examples of instruments translated and adapted from English to Spanish using the cultural equivalency model and other useful documents generated or utilized during the process.

CHAPTER 1.

Introduction

Disparities exist in the use of inpatient and outpatient mental health services between persons who are White and persons who are Black/African American, Hispanic/Latino, American Indian or Alaskan Native, Asian, or Native Hawaiian or Other Pacific Islanders (referred to as ethnic minorities or ethnic groups in this toolkit). When compared to persons who are White, ethnic minorities receive less outpatient mental health services and receive more inpatient and emergency services (Alegria et al., 2002; Chow, Jaffee, & Snowden, 2003; New Freedom Commission on Mental Health, 2003; Smedley, Stith, & Nelson, 2003; United States Public Health Services Office of the Surgeon General, 2001). More data is needed to understand the extent of the disparities and circumstances under which they are likely to occur (Smedley et al, 2003). However, at present ethnic minorities are significantly under-represented in mental health research (New Freedom Commission on Mental Health, 2003; United States Public Health Services Office of the Surgeon General, 2001). A challenge for researchers and evaluators studying diverse ethnic groups and cultures is ensuring that instruments utilized are equivalent across groups; that is, the instrument should convey the same meaning in different languages and across different cultures, so that the understanding of the items should elicit the same type of responses. Only by achieving this equivalence will it be possible to compare substantive results that are not confounded by instrumentation artifacts. Attaining this equivalence to study ethnic minorities in the United States sometimes requires translating instruments into languages other than English. Furthermore, for all ethnic groups, even those whose native language is English, such as African Americans, making instruments culturally appropriate involves cultural adaptations.

Conceptual Considerations

Culture serves as a web that structures human thought, emotion, and interaction (Canino & Guarnaccia, 1997). It is a dynamic process in which social transformations, social conflicts, power relationships, and migrations affect views and practices. Culture is the product of group values, norms, and experiences as well as of individual innovations and life histories. Although ethnic minorities share a common context with mainstream culture, each group has unique cultural characteristics that permeate their lives. These characteristics are the product of the continued interaction of their culture of origin with the dominant or majority culture. Cultures and subcultures vary not only by national, regional, or ethnic background, ancestry, immigration status, and country of origin but also by age, gender, and social class. All these considerations must be taken into account when studying ethnic minorities.

Most researchers and evaluators agree on the value of cross-ethnic and cross-cultural research findings and on the need to make research culturally sensitive (Bravo, 2003; Canino, Lewis-Fernández, & Bravo, 1997). The goal of cultural sensitivity is to increase the scientific accuracy of the research rather than merely promoting multicultural political correctness (Rogler, 1999a).

Rogler (1999) argues that cultural insensitivity arises when experts transfer concepts across cultures uncritically and develop translations that are conformed exactly to the original standardized versions without needed adaptations. This kind of approach tends to suppress, bias, and deflect cultural understanding. However, there is disagreement as to the degree of cultural or ethnic modifications that should be incorporated into research instruments. Cross-cultural studies can be approached from two different perspectives, which together have been called the *emic-etic paradigm* (Brislin, Lonner, & Thorndike, 1973). The emic perspective involves the evaluation of the studied phenomenon from within the culture and its context, aiming to explain the studied phenomenon's significance and its interrelationship with other intracultural elements "from the inside." This approach attempts to describe the internal logic of a culture, its singularity, considering this a necessary step prior to any valid cross-cultural analysis. The etic perspective, on the other hand, is basically comparative. It involves the evaluation of a phenomenon from "outside the culture," aiming to identify and compare similar phenomena across different cultural contexts (Brislin, Lonner, & Thorndike, 1973).

Both emic and etic approaches display advantages and disadvantages (Canino et al., 1997). Critics argue that cross-cultural research based on the emic approach neglects the problem of observation bias. The lack of methodological homogeneity across studies of different cultures can result in the inability to disentangle methodological from substantive factors when variability in cross-cultural comparisons is observed. For example, it may hinder the test of causal hypotheses across cultures. Using this approach, although a thorough understanding of concepts relevant to one culture is obtained, they are not necessarily comparable to those of other cultures. On the other hand, the etic approach has been criticized for emphasizing reliability at the expense of validity. It may impose the appearance of cross-cultural homogeneity that is an artifact of the use of a constricted conceptualization embedded in the instrumentation. This limitation has been called the "cultural fallacy" (Kleinman & Good, 1985). Several investigators have devised strategies that attempt to integrate emic and etic perspectives into one overall research methodology that is both culturally valid and generalizable (see Canino et al., 1997, for examples from mental health research). Reconciling these two different paradigms is one of the major challenges facing cross-cultural researchers and evaluators who aim to translate and adapt instruments. To the extent possible, we tried to achieve a *derived etic* approach (Berry, 1969; Phillips et al., 1996), which would incorporate cultural flexibility into the adaptation of the instrument, while retaining cross-cultural generalizability of the findings. Our research team from the University of Puerto Rico, which also includes investigators from other universities and organizations, has devised a number of strategies that attempt to integrate emic and etic perspectives into one overall research methodology for the translation and adaptation of instruments that is both culturally valid and generalizable. These include using a cultural equivalence model (described below), performing focus groups or ethnographic work, and the use of a Multi National Bilingual Committee (Matias-Carrelo et al., 2003; Canino & Bravo, 1994; Canino et al., 1987; Lewis-Fernández, & Kleinman, 1995; Manson et al.,

1992; Lopez & Guarnaccia, 2000; Lewis-Fernandez et al., 2002; Guarnaccia, Rivera, Franco, & Neighbors, 1996).

Considerable care is needed to assure that a systematic process of translation and adaptation of an instrument is followed so that cultural equivalence can be achieved. There is evidence that an inadequate translation and adaptation of an instrument can result in a lower reliability of the translated instrument as compared to the reliability of the same in its original language (Berkanovic, 1980). Achieving linguistic equivalency is the first step in this comprehensive process, but by no means the only one. Equivalency in the observations made in the different cultures is essential, while at the same time it is important to include in the research those aspects that are distinct and have no apparent equivalencies across cultures. To attain cultural equivalency, we have used a translation and adaptation model that evaluates the instrument in several dimensions: *semantic, content, technical, criterion and conceptual equivalence* (Bravo, Canino, Rubio-Stipec, & Woodbury, 1991; Canino, Canino, & Bravo, 1994). *Semantic equivalence* is conveyed by the similar meaning of an item in each culture, *content equivalence* is achieved through culturally relevant content of items, *technical equivalence* to the requirement that the original and translated version yield comparable data, *criterion equivalence* to similar evaluation and interpretation of results, and *conceptual equivalence* to the similarity of the theoretical construct being evaluated in the different cultures. In the next chapter we describe these dimensions and various techniques used to translate and adapt instruments.

CHAPTER 2.

A Cultural Equivalency Model for Translating and Adapting Instruments

Brislin (1970; 1986) suggested a model of translation that has been widely used in research and consists of a series of repeated translation and back-translation exercises by a team of bilingual translators who are blind to the previous translation. This process continues until the back-translation is considered to reflect congruence of meaning between the original instrument and the translated one. Nevertheless, cross-cultural research has demonstrated that when a different language is involved, translation and back-translation techniques are usually not sufficient to obtain cultural equivalency of the instrument. These techniques do nothing to capture the perspectives of the culture of interest, which is of great importance (Hilton & Skrutkowski, 2002; Jones, Lee, Phillips, Zhang, & Jaceldo, 2001; Rogler, 1999b; Geisinger, 1994). Multiple linguistic and socio-cultural factors must be considered, such as determining whether the construct that the original instrument evaluates is pertinent to the target culture.

In general terms, culture can be described as a product of a group's values, norms and experiences as well as an individual's innovations and life histories (Canino & Guarnaccia, 1997). Unlike the back-translation method discussed above, the process of translation and adaptation to be described in this toolkit is based on a conceptual definition of culture and on a comprehensive process guided by a conceptual model, (Flaherty et al., 1988; Gaviria et al., 1985; Flaherty, 1987) which focuses on cross-cultural equivalence. This conceptual definition of culture proposes that obtaining equivalence between cross-language and cross-cultural versions of an instrument can be achieved by obtaining evidence about their *semantic, content, technical, criterion and conceptual equivalence*. Therefore, this model frames the cultural adaptation of an instrument in the context of the process of establishing construct validity of a measure. This cross-cultural equivalence model is based on the premise that psychopathologic phenomena are universal, yet considerably influenced by the socio-cultural context in which they occur. This model was successfully used in the translation of epidemiological instruments in Puerto Rico for both adult and children populations (Matias-Carrelo et al., 2003; Bravo et al., 1991; 1993; Canino & Bravo, 1994; Canino et al., 1999). A description of each type of equivalence now follows.

Semantic Equivalence

Semantic equivalence requires that the meaning of each item in the instrument is similar in the language of each cultural group. When an already existing instrument is involved, a thorough process of translation is required to attain this type of equivalence. Depending on the length of the instrument this process can take weeks to months to complete. Therefore, the translation of research or evaluation instruments for use with ethnic minorities is a difficult and costly endeavor.

Nevertheless, conscientious study of ethnic minorities whose native language is not English requires this type of meticulous translation. Regrettably, most instruments are not developed with their translatability in mind (Draguns, 1980). However, guidelines for using translatable language on research instruments were formulated some time ago. To facilitate the translation of English into other languages, Brislin and colleagues (1973) formulated the rules outlined in Table 1. But, even when using these rules, some terms or verbal forms may not have adequate equivalents in other languages.

Table 1

Guidelines for Translatable Language on Research Instruments

1	Use short, simple sentences
2	Employ the active rather than the passive voice
3	Repeat nouns instead of using pronouns
4	Avoid metaphors and colloquialisms
5	Avoid the subjunctive mode (e.g., use of could or would)
6	Avoid adverbs and prepositions telling "where" or "when"
7	Avoid possessive forms
8	Use specific rather than general terms (e.g., cows, pigs instead of livestock)
9	Avoid words that indicate vagueness about some event or thing (e.g., probably, frequently)
10	Avoid sentences with different verbs if the verbs suggest different actions

Note: Brislin et al., 1973

The best procedure to enhance equivalence in translations has been labeled *decentering* because the procedure does not center around any one culture or language (Brislin et al., 1973). This procedure involves changing the original source version of an instrument if, during the translation process, those doing the translation identify that some terms or verbal forms do not have acceptable equivalents in the translated language. Therefore, both the original and translated versions of the instrument are open to revision to increase equivalence across languages. Through iterations of translations and back-translations, appropriate wording in the source and target languages is achieved. When developing instruments for use in diverse ethnic groups, this procedure is the best alternative because when versions of an instrument are decentered, they are in an equal linguistic partnership: the wording in each language is familiar and salient to respondents in the cultural groups involved (Rogler, 1999a). The use of a decentered model increases the complexity of the process, but the end results usually have greater construct validity. However, this alternative is almost never used in the development of instruments, because the increased complexity implies greater costs and a much more time consuming process. Even when a second language version of the instrument is being created concurrently to the original, the original instrument is seldom modified to conform to the second language translated version. Therefore, instruments usually have to be translated taking into consideration that modifying the original version is rarely an option.

Content Equivalence

Content equivalence refers to whether the content of each item is relevant to each cultural group or population under study, that is, if it evaluates a phenomenon that occurs in and is noted as real by members of the ethnic or cultural groups. A committee composed of people who are familiar with both cultural groups and the content of the instrument can attain content equivalence through careful revision. A procedure similar to rational analysis, which is usually employed to obtain evidence about content validity in the development of an instrument, should be employed. That is, a panel of judges, usually composed of experts in the construct to be assessed, decides whether the instrument's items reflect the concept under study. However, this procedure is sufficient in the judgment of items only when researchers or evaluators and respondents share the symbolic systems of the same culture (Rogler, 1999a). In other words, when they share common elements in the understanding of the same culture, items are developed and standardized with ease. When researchers or evaluators and respondents have little or no cultural symbolism in common, this procedure is not sufficient. In this case, detailed cultural observations must provide supplementary information.

Cultural observations are conducted to determine whether the construct that the original instrument measures is pertinent to the target cultural group, and whether the operationalization of the construct is appropriate. Differences not only across groups but also within the same ethnic group (e.g., socioeconomic, gender, or age differences) must be considered in both processes. These determinations sometimes can be made in the selection of the instrument to use in a particular population, even before it is translated, but at other times they are revealed through pilot testing.

Technical Equivalence

The technical equivalence of an instrument refers to the requirement that the original and translated versions must yield comparable data when used in the different cultures. Sometimes differences identified between cultures that have used the same assessment instrument could be due to differences in the assessment technique being used, rather than the content of the instrument. It is thus important to start an evaluation of the technical equivalence of an instrument before the onset of the study. This evaluation consists of a careful consideration of the capabilities of the targeted respondents and their familiarity with the instrument's format and administration technique. A multicultural committee familiar with the population under study can do this revision. However, field testing is essential.

Testing the reliability of an adapted instrument is an additional way for determining whether the assessment technique is appropriate for the particular group studied. Usually test-retest reliability and internal consistency are obtained. If the instrument is not reliable, inconsistent answers are likely to be obtained. Moreover, reliability results from the adapted instrument that are similar to those obtained with the original version constitute another evidence of the technical equivalence of

the instrument in both cultures and ethnic groups studied. Other more complex statistical techniques (e.g. Item Response Theory) have been developed in the education field to test equivalence in measurement among different language versions of structured instruments (see, e.g., Hambleton, 1991; Reise, Widaman, & Pugh, 1993). These techniques are recently starting to be integrated in the health outcomes field to test measurement equivalence (Hambleton, 2000), but are still found to be complex, with software packages providing limited applications and the sample size required is usually much larger than that needed with traditional methods. We hope that in the near future the methods and programs available to conduct measurement equivalence will be simplified and become readily available to all researchers who wish to conduct this important line of work.

Criterion Equivalence

Criterion equivalence implies that the interpretation of the results obtained from the measure is similar when evaluated in accordance with the established norms of each culture. It involves techniques similar to those used to assess criterion validity of a measure. In other words, the interpretation of an instrument's relationship to established independent criteria for a certain event is the same across culture. However, it is very important that the criterion that serves as a validator is culturally appropriate. Again, the similarity between the observed validity results using the adapted version and those obtained with the original instrument attests to the criterion equivalence between both versions of the instrument.

Conceptual Equivalence

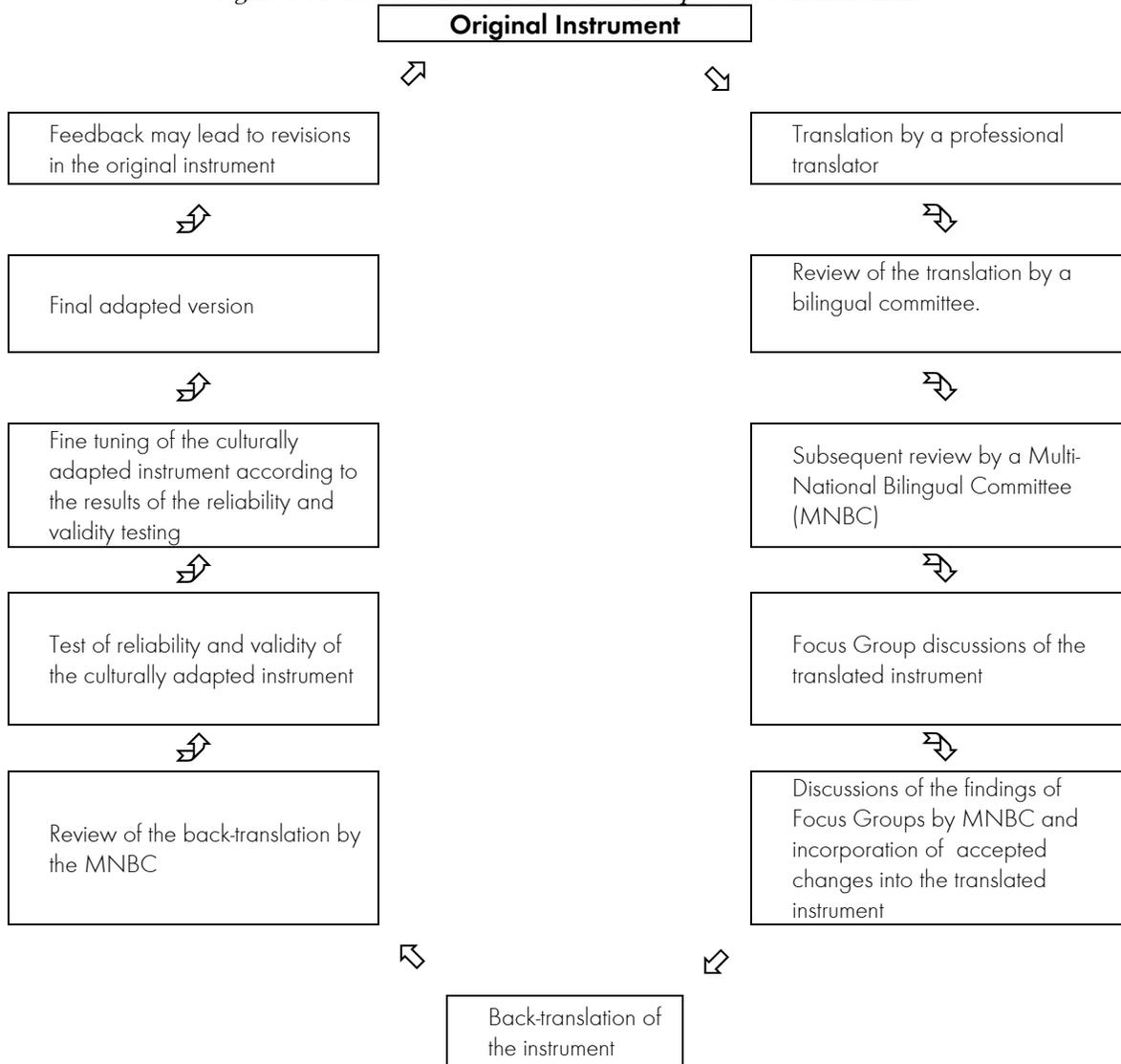
Conceptual equivalence, sometimes called construct equivalence, requires that the same theoretical construct be evaluated in the different cultures involved. Procedures similar to those used to attain construct validity of instruments can be used (see Allen & Yen, 1979). One of the strategies is to use factor analysis to check the similarities in factor structures among versions of the same instrument. Another strategy is to determine the relationship of the construct with other relevant concepts derived from theory or previous research, to test whether hypothesized relationships are confirmed. An example of this strategy is provided in the Chapter 4.

CHAPTER 3

Steps for Translating and Adapting Instruments

Figure 1 illustrates the recursive stages that are part of the complex process of translation and adaptation. In Chapter 3, we will discuss each step and its essential nature, the sum of which lead to the five types of equivalency needed to conduct relevant and meaningful cross-cultural comparisons. Then, in Chapter 4, we will provide examples for each type of equivalence. We hope that reviewing and referencing the figure below offers a framework in which to organize the stages needed to complete this intricate task.

Figure 1: Process of translation and cultural adaptation of an instrument



In order to attain the cultural equivalence, a sequence of translation techniques should be employed: independent translation by a professional translator, initial review by Bilingual Committee, review by a Multi-National Bilingual Committee (MNBC), focus groups, subsequent back-translation, and

then qualitative re-evaluation by the Bilingual Committee and the Multi-National Bilingual Committee (MNBC). Described below are the sequential steps for translating and adapting instruments.

Step 1 Original Instrument

The evident first step in translating and adapting an instrument is to select an instrument. This process usually involves an extensive literature review to determine the available instruments under the topic being studied. The instruments available should be carefully examined to see if its constructs, dimensions and operational definition are appropriate to the target group. Of those examined, the selected instrument should be the one considered to be most appropriate given the considerations previously mentioned.

Step 2 Translation by a Professional Translator

Once the investigators have selected the instrument or items with which they will work, the second step is the translation of the instrument into the target language. This translation should be conducted by a professional translator. Be aware that, in some cases, finding qualified professional translators might be a challenge. We recommend using translators that have been certified by the American Translation Association, if possible. For best results when translating, it is preferable that the translator's first language be the same as the target language. If a translation already exists, it should be reviewed to ensure that its quality is acceptable to proceed. Otherwise, an alternate translation should be conducted.

Step 3 Review of the translation by a Bilingual Committee

Once the instrument has been translated, the next step is to have the translation reviewed by a committee of experienced researchers, evaluators, or professionals familiar with the field being studied and fluent in both the source language and the target language of the instrument. The wording of those items evaluated as presenting difficulties in comprehension, or inadequately communicating their intent, should be modified to overcome the limitations found.

Step 4 Subsequent Review by a Multi-National Bilingual Committee (MNBC)

The version of the instrument reviewed by the Bilingual Committee is then submitted for review to the MNBC. The use of an MNBC is essential to instruments that will be used in several countries, with people of varied ethnicities or even with diverse subgroups within an ethnic minority. The importance of this committee lies in the representation of all groups being considered. Therefore, a suitable synonym would be *Culturally Diverse Bilingual Committee*. The members of this committee make the final decisions regarding each item, usually by reaching a consensus between the members or by a majority vote. Consequently, it is extremely important that the members be knowledgeable about the constructs that the instrument assesses, as well as the populations being studied, with an implied good command of the language or languages. Items with difficult words to translate and

those deemed as regional to one culture are identified, discussed and evaluated by the committee. The committee then agrees on final wording, usually using words that are common to all cultures considered. When consensus cannot be reached for a word or an item, different words or phrases are placed in parentheses to reflect the meaning specific to each culture. We have found that two extremely useful tools are the development of a “difficult words” dictionary and a list of “non-consensus words”. Both the dictionary and list contain words that through experience have been documented to work best for a specific group, or to be the most accurate alternative when a perfect translation is impossible. The “non-consensus” word list also contains synonyms for an event or object in different sub-groups, cultures or countries that use a same language. The MNBC should constantly strive to simplify the translation and to make it accessible to a low literacy group while maintaining the comprehension of items.

Step 5 Focus Group Discussions of the Translated Instrument

Field testing of the instrument is essential. Therefore, the next step is to conduct focus groups sessions with a sample of the target population. Several focus groups are usually conducted, at least one for each culturally diverse group involved; and sometimes several are conducted per site if there is more than one target population in each location, i.e., different ages, educational levels, socioeconomic status, different sub-groups or cultures. We have found that conducting two sessions per focus group is extremely helpful. The first’s session’s purpose is to discuss the construct that is supposed to be measured by the instrument. The second session is devoted to going over every item contained in the instrument in detail. For more information on how to conduct focus groups please refer to Richard Kreugar’s 2000 book “Focus Groups: A Practical Guide for Applied Research” or to “The focus group kit” Morgan, D. and Krueger, R., 1998. An alternative to focus groups is to conduct in-depth cognitive interviews, which also provide a valuable source of information. Cognitive interviews differ from focus groups in that they are conducted individually and provide rich narrative and descriptive detail from the person’s point of view. If possible, both should be conducted. The richness of the information obtained in both focus groups and cognitive interview sessions never ceases to amaze us, and the information gathered illustrates how diversity may exist even within one subgroup or culture. For example, for Lehman’s Quality of Life interview in the domain related to performance and daily activities, participants were asked about things they could do during their free time in the last week. The original list included possible activities such as: “go walking, go shopping, go to a restaurant or café, and read a book”. Focus group participants identified many additional activities as relevant. The research team evaluated the cultural relevance of each activity and noticed that a very popular suggestion in Puerto Rican participants was “going to the beach,” nevertheless for other Latino participants in the United States this option was not appropriate, therefore only activities that were appropriate to all Latinos were approved. For example: “going to church, listening to music, going to the movies, and taking care of someone else”. When psychometric testing was conducted on the expanded subscale,

improved reliability was seen across all sites tested, implying greater technical equivalence to the English version.

Step 6 *Discussions of the Findings of Focus Groups by MNBC & Incorporation of Accepted Changes into the Translated Instrument*

Each site that conducted a focus group, usually representing a distinct group, prepares a report that summarizes the discussion and the changes suggested by each group. These reports are then taken to the MNBC to review and to decide which of the suggested changes should be accepted and how they will be incorporated into the instrument. Sometimes, based on the focus group suggestions, new questions are developed and added. This is sometimes necessary when the instrument is lacking a domain that has been overlooked and is considered essential to the construct. When these new questions are added, they are placed at the end of the instrument to avoid confounding of the original instrument in the psychometric testing phase.

Step 7 *Back-Translation of the Instrument*

In the next step, the resultant version of the instrument is then taken to be back translated by an independent translator, that is, a person not involved in the earlier translation. It is now preferable that this translator's first language be the same as the source instrument language.

Step 8 *Review of the Back-Translation by MNBC*

The MNBC then compares this back-translated version of the instrument to the original version. Any item that does not retain its original meaning and intent is re-translated into the target language and subsequently submitted to the same process of scrutiny. This process can be costly and very time-consuming, but extremely important in helping to recognize words or phrases that through translation have lost their original intended meaning. (See Table 2 on useful tips for participating in an MNBC meeting.)

Throughout these first seven steps, language appropriate to the level of the cognitive, cultural and language development of the persons to be interviewed should be sought. Weidmer, Brown, and Garcia (1999) have stressed that the reading comprehension level of an instrument in its source language is not necessarily maintained when it is translated. In order to avoid this one should aim to develop instruments with the following characteristics: (1) To be written in a grammatically correct and simple language comprehensible to the target populations regardless of their culture of origin or ethnic background and understood by people of different educational levels; (2) To include vocabulary of common usage and content that is relevant to the different cultural groups; (3) To include items that have a meaning similar to that of the source language instrument.

Table 2

Useful tips for participating in MNBC meeting	
1	When face to face meetings are not possible, use a good conference call phone or preferably video conferencing equipment to try and achieve the same effect.
2	At least two note takers should be designated during these meetings. One note taker should be assigned to integrate changes to the instrument (preferably working on a digital copy) and the other should take notes on the reasons given to support each decision.
3	Arranging meetings between different investigators and sites is typically difficult and there is usually limited time to take notes, therefore the session should be taped, if possible.
4	Always have available a copy of the instrument in the source language. Also, if the instrument has undergone more than one revision, have previous versions with tracked changes and comments available.
5	A report on the session should be made as soon as possible after the session has taken place to retain as much detail as possible.
6	The report should then be distributed among the members to review, make corrections and to assure that a consensus has been reached.

Step 9 *Test of Reliability and Validity of the Culturally Adapted Instrument*

This step involves testing the adapted instrument to document its reliability and validity. The field testing of the instrument is not only an additional tool to investigate the instruments technical equivalence, but it is vital in providing evidence for achieving criterion and/or conceptual equivalence.

At minimum, a test re-test of the instrument should be conducted to establish that it is reliable both across time (two administrations, usually two weeks apart), and through measuring its internal consistency. These results should then be compared to the original source language version of the instrument. In addition, techniques similar to those used to assess criterion and conceptual validity can also be involved in the process. To achieve construct and conceptual equivalence, it is very important to plan ahead the strategy that will be used prior to the testing phase. Additional expenses and resources are often needed depending on the strategy to be employed. A method that has been used in the field of Epidemiology (Bravo et al., 1993; Canino et al., 1987; Rubio-Stipec, Bird, Canino, & Gould, 1990) to test the criterion validity of an adapted instrument is to compare the results from diagnoses produced by an instrument and those given by clinicians. In this case the expert judgment of the clinician is used as the external criterion. To the extent that similar results are obtained with the source language version of the instrument, compared to the adapted version, one can say that criterion equivalence of the instruments has been achieved.

A strategy that has been used to attain the construct validity of an instrument is to use the current theory regarding the construct being measured by an instrument to make a prediction or

hypothesize on how a score obtained on that instrument, should behave in a given situation. For example, an instrument that measures global impairment would be hypothesized to indicate greater impairment in a group of severely mentally ill patients than in a sample of people randomly sampled from the community. For this example we also believe that this relationship would remain constant across cultures, given that the instrument is correctly reflecting the construct in each. Therefore, we would need two groups to test this hypothesis: one of severely mentally ill patients and another group of persons sampled from the community. To the extent that the adapted instrument confirms our hypothesis, as expected of the original instrument, we would feel confident in sustaining we have achieved conceptual equivalence.

Take into consideration how different types of participants will respond to skip patterns that have been built into the instruments. This is extremely important when planning sample size for the reliability and validity phase. For example, subscales within an instrument sometimes tap a specific area that might be uncommon in a certain group of participants. This is the case of a work subscale when sampling from mental health populations. Severely mentally-ill patients rarely sustain a job and would be skipped out of this subscale. Therefore, careful planning would suggest a bigger overall sample size for the instrument to then reach the advisable power required to conduct analyses for this subscale.

Step 10 Fine Tuning of the Culturally Adapted Instrument According to the Results of the Reliability and Validity Testing

This next step is a direct result that stems from step 9. The adapted instrument should now undergo an additional fine tuning, based on the results of the reliability and validity testing. Even at this late stage in the process it is possible to realize that scale or subscale within an instrument is inadequate in some way and requires further modification.

Step 11 Final Adapted Version

If all goes well, the next step is to produce a final adapted version of the instrument which is made available to researchers and evaluators. The best test that the hard work expended in getting to this step has been worth the effort will hopefully be the proliferation in the use of the adapted instrument.

Step 12 Feedback May Lead to Revisions in the Original Instrument

It is important to remind ourselves that achieving true cultural equivalency is an ongoing process because it is based on the values, norms and experiences of the individuals in question and these change over time. Sometimes, the work done on the adapted instrument is being conducted many years after the original instrument was developed. For this reason and others previously mentioned (i.e., language equivalence) the adaptation process will occasionally suggest one last step, making revisions to the original instrument. In our experience, getting these changes incorporated into the

original instrument has been extremely difficult, especially if the instrument has been widely used and documented in its original version. We realize that the implications of changes to the original instrument might be numerous and may require additional testing, something few researches like to hear. However, failing to do so in certain circumstances reflects cultural insensitivity, not only to the culture that originated the changes but to the source culture as well.

CHAPTER 4

Examples From the Field: Translating and Adapting Instruments From English to Spanish

In this chapter, we will provide examples to illustrate and facilitate the comprehension of the five types of cultural equivalencies: *semantic, content, technical, criterion and conceptual equivalence*. The difficulties and examples presented will mostly come from the work conducted to translate and adapt five outcome measures from English to Spanish (see Matias-Carrelo et al., 2003), but the issues involved are considered to be sufficiently general in character that can apply to instrument adaptations involving other research topics as well as other cultural and ethnic groups.

The instruments used by Matias-Carrelo et al. (2003) were: The World Health Organization-Disability Assessment Scale (WHO DAS II), a measure of functioning and disability that can be used for patients with physical and mental problems (Vázquez Barquero et al. 2000; World Health Organization 2000); The Burden Assessment Scale used to assess the burden of families with a serious mentally ill member (Reinhard et al. 1994); The Family Burden Scale, designed to explore the burden of a caregiver when taking care of a relative with a serious health problem (Kessler et al., 1994); Lehman's Quality of Life Interview, a short multidimensional measure of Quality of Life (Lehman 1988); and CONNECT, a measure designed to assess continuity of care in mental health services (Ware et al., 1999; 2003) (Please refer to the mentioned article for more information on each instrument.) The selection of these measures was based on a number of criteria, such as: brevity, wide usage with mentally ill patients to allow for comparisons, presence of domains with face validity for Latino culture, and good psychometric properties published with other populations. The translation and adaptation involved both the Spanish language and culture representative of the Island of Puerto Rico and Mexican Americans from Fresno, California and San Antonio, Texas. Also important to note is that the Mexican American samples reflected different degrees of acculturation to the United States culture. Most participants in all three sites belonged to low and middle low SES.

Field Examples - Semantic Equivalence

In our attempt to obtain *semantic equivalence* (similar meaning of items in each culture) some of the words and phrases of the instruments had to be changed in order to make the language simpler and more understandable. Feedback as to how and what to change was obtained from the focus groups, the Bilingual Committee and the Multi National Bilingual Committee. Changes were necessary because the language to be used had to be common for different Latino groups and understandable for people of different educational levels. We will present two examples from the Burden Assessment Scale (See Appendix A for Spanish and English items).

The first is an example of a word in English (“frictions”) that when used in its literal translation in Spanish (“fricciones” or “roces”), retains the meaning of the English word but becomes a word not

commonly used by people with less than high school level of education. In other words the level of difficulty in the word was increased by the translation. Therefore, a decision was made to translate the item: "Experienced family frictions and arguments", as "Ha tenido *desacuerdos* (disagreements) y discusiones con la familia," a word with similar meaning but with a wider usage.

The second is an example of substituting a word or phrase when it is impossible to find a word or phrase in the target language that maintains the original meaning of the words used in the source version. The word "embarrassed" was part of an item that intended to assess how the caregivers feel about the behavior of their mentally ill relative. We have found that the word "vergüenza" (ashamed) is commonly used as a translation for the term embarrassed, but has a very negative connotation that goes beyond of the meaning of the item's intent. Both, the MNBC and the focus groups' participants suggested using "incómodo" ("uncomfortable") instead of "vergüenza", because it was not possible to find a word that could be a literal translation for embarrassed and maintain the intent of the item.

Sometimes, when multiple ethnic groups are involved, a term common to all groups is not found. In these situations the word or phrase indicating an ethnic variation or regionalism is included in parentheses so that the appropriate word can be selected in each group. In our experience, this has been the case with the phrase "how often" or "how much". The former is usually substituted by three phrases: "Cuán a menudo//Qué tan seguido/ Con qué frecuencia" and the latter by two: "qué tanta/cuánta". For example, we usually find that Puerto Ricans use "Cuán a menudo" and Mexicans use "que tan seguido" and "que tanta", while Spaniards use "con qué frecuencia" and "cuánta".

Field Examples - Content Equivalence

The *content equivalence* of the instruments, that is, whether the content of each item is relevant to the populations under study was assessed by the focus group participants, the Bilingual Committee and the Multi National Bilingual Committee. Both Bilingual Committees should check each item being evaluated to see if the phenomenon that is being described occurs in and is noted as real by members of the different subcultures represented. When content is identified as inappropriate, the inadequate term is substituted by pertinent concepts. In other words, the content is substituted by terms which are thought to appropriately convey the intent of the item.

In our following example, some changes were incorporated to the Family Burden Scale (See Appendix B for Spanish and English items) as a result of the focus group discussions, to attain the *content equivalence* of the instrument. The focus groups participants suggested that for one of the items it was more pertinent to incorporate examples in parentheses that reflected the kind of activities they did in order to help their relatives, such as: going to buy medicines, taking them to medical appointments and taking them to special activities. In addition, focus group participants suggested including members of the extended family, besides parents, brothers/sisters, sons/daughters and spouses/partners in the list of relatives to consider during the interview. In the

Latino culture, the concept of the nuclear family is expanded and other members are integrated and considered close family members, like grandparents and uncles (Marin & Van-Oss Marin, 1991).

When considering the relevance of the items of the instruments to the Latino sub-groups we found that the content of some items in the WHO-DAS II¹ presented some difficulties to participants in the focus groups. Several of the items inquired about impairment related to “household responsibilities”. This term was originally translated by an international team of translators sponsored by the WHO as “quehaceres de la casa” (household chores). However, this translation had not been examined in focus groups. The reaction of the participants was that the term “household chores” was related to things that only women do in the house and men wouldn’t be able to respond to these items since they would not consider “household chores” as pertinent to them. After the focus group discussions the expression was changed to “actividades de la casa” (household activities) to make it more appropriate to Latino men. Furthermore, the focus group participants and the MNBC suggested the inclusion of examples in the preamble of the section about “household activities” that would illustrate those activities that are sometimes done by men as: “pagar las cuentas” (paying the bills), “sacar la basura” (taking out the garbage) and “cortar el césped” (cutting the lawn).

Content equivalence is impossible to achieve when the content of the original version of the instrument is not relevant or nonexistent in the target culture in which the instrument is to be used. For example, several items of Lehman’s Quality of Life Interview (See Appendix C) inquire about different types of sources for financial support, such as “Social Security Income (SSI)”, which is a supplemental financial program in existence in the United States, but not in Puerto Rico. The MNBC decided to maintain the item in the instrument since it was relevant for the Latinos living in the United States. However, for use among island Puerto Ricans or with other Latinos living outside the United States the item would need to be deleted.

Field Examples - Technical Equivalence

In order to attain *technical equivalence*, it is important to maintain similarity in the layout and technical conventions such as presence of boxes, underlying or bolding of words, punctuation and syntax, numbering and coding system. Technical equivalence also involves resolving technical difficulties of the instrument, which can make questions hard to understand and answer. The technical equivalence of an instrument will be evaluated by the Bilingual Committee, the MNBC, and the focus groups, followed by the reliability assessment.

Besides obtaining the reliabilities of the instruments and comparing them to the reliabilities of the original instruments, Matias-Carrelo et al. (2003) also examined whether the measuring strategy used such as face-to face-interviews, would obtain a similar effect in the different cultures. The

¹ For the WHO-DAS II, please refer to <http://www.who.int/icidh/whodas/>

MNBC judged the measuring strategy to be appropriate for studying the targeted populations because all the participants were familiar with the process. Care was also taken to maintain the same layout and format of the original instruments in their translated versions. A difficulty that is sometimes encountered during translation is that the translated version ends up with sentences that include double negatives, or that sentences phrased using a negative are coupled with a response scale that creates a double negative situation. When this problem is encountered the sentence should be rephrased even if it means ending up with a different sentence, always ensuring that the same meaning of the source version has been maintained.

Field Examples - Criterion Equivalence

The Criterion equivalence of Lehman's QOLI was enhanced by expanding the dimensions of the Quality of Life construct as suggested by the Bilingual Committee, the MNBC and the focus groups. The original version of the QOLI does not include a dimension for religiousness or spirituality and previous literature in the field of physical and mental health research (Guarnaccia, 1996) had made us aware that it was an important criterion to examine as part of the evaluation of the quality of life.

Focus groups conducted in all three sites (Puerto Rico, California and Texas) confirmed the cultural relevance and appropriateness the construct of religiousness/ spirituality. Prior to the focus groups several items from the "Multidimensional Measurement of Religiousness/ Spirituality" (MMRS) were selected to be screened. However, focus group discussions showed that the number of items selected was insufficient to capture this dimension in a quality of life measure. Therefore, the inclusion of several other items was incorporated.

Several items were also added to this and other instruments in response to suggestions made in the focus groups. In the reliability and validity testing phase of this process, the psychometric properties of each item was evaluated. As a result of poor item-total correlations that affected the internal consistency of the scale many of the suggested items had to be dropped. On the other hand, the inclusion of some items improved both types of reliability assessed (internal consistency and test-retest), thus improving technical equivalence. Additionally, the inclusion of these items increases the criterion equivalence of the instrument because the scores derived from it are made more similar or culturally consonant to the interpretation of equal scores in the source culture.

Field Examples - Conceptual Equivalence

To attain evidence for conceptual equivalence in the Spanish translation and adaptation of the Diagnostic Interview Schedule for Children (DISC) the strategy used was to test the relationship of the construct (being classified with a disorder) with other relevant concepts derived from previous research (impairment, adaptive functioning and school problems) to see if the hypothesized relationship was confirmed.

Bravo et al. (1993) hypothesized that children classified by the DISC as disordered would have higher levels of impairment (as measured by the Children's Global Assessment Scale) (Shaffer et al., 1983), lower levels of adaptive functioning (Beiser, 1990), and more school problems (dropping out, absenteeism, failure, detention, suspension, attending special classes) as compared to children who did not meet DISC diagnostic criteria. The results obtained generally supported their hypotheses, suggesting that the adapted instrument was evaluating phenomena associated with dysfunction in social, psychological, and academic dimensions in children and adolescents, a finding that would be expected from an instrument appropriately evaluating psychiatric disorders in both cultural contexts.

CHAPTER 5

Conclusions and Recommendations

In the previous four chapters we learned of the need for culturally sensitive instruments and of the conceptual and methodological considerations involved in the process of translation and adaptation. We described a cultural equivalency model for translating and adapting instruments and provided researchers and evaluators with tools and concrete steps for implementing the process, followed with examples from the field. Multiple challenges must be overcome to complete this difficult process of translation and adaptation. By now, the reader should be aware that the systematic process presented is extremely time consuming and that many months, most probably even years, are needed to complete one full cycle of the model presented. The researcher or evaluator is faced with the challenge of retaining the singularities of each culture investigated while producing a translated and adapted instrument that is equivalent to the original version thus retaining cross-cultural generalizability of the findings. The team effort of the Bilingual Committee, the MNBC and the focus groups or ethnographic interviews, will be invaluable in obtaining options for those words or phrases that are impossible to translate and providing guidance on how best to capture the comprehensive meaning of a complicated construct. As discussed in Chapter 3 under Step 4, we recommend the use of both the dictionary of “difficult words” (See Appendix D) and the list of “non-consensus” words (See Appendix E). Once developed, these tools will save a great amount of time in subsequent translations to both the bilingual and MNBC committees. It is crucial to follow all the steps presented in Figure 1 (Chapter 3). Also, the back translation step, which is sometimes skipped in practice (Van de Vijver & Leung, 1996), is an indispensable opportunity to identify problems in the new translation before psychometric testing.

The increasing need for culturally sensitive instruments makes cross cultural research indispensable. The planning of a cross-ethnic collaborative process in the development of an original instrument or in the translation and adaptation of an already existing one will be complex, time consuming, and will invariably produce higher costs, but the results will be worth the effort. When multiple sites are involved we recommend a detailed timeline (See Appendix F) of how the work of each team will be conducted and specific deadlines for each step. In most cases one site will lead the effort. The diligence, coordination and organization skills of that site will produce a ripple effect that can, in a worst case scenario, save the overall project when difficulties are encountered on other sites. We also recommend a recruitment plan. This plan should be prepared to ensure enough monolingual or bilingual participants will be available for each site, especially when both the source and target version of the instrument will be tested.

Theoretically, the different types of equivalence are frequently expected to be mutually exclusive (Flaherty et al., 1998), but there is a dynamic relationship between each. We believe this important lesson was exemplified in Chapter 4. Hard work towards achieving one type of validity will sometimes facilitate several others. Keep in mind that, as with construct validity, they all lend a

hand towards achieving conceptual equivalence. And that each type by itself is necessary, but insufficient, if the goal is cultural equivalence.

In this toolkit researchers and evaluators should have a clear guide to plan, organize, and conduct their incursion into the translation and adaptation of an instrument, as well as the knowledge to foresee possible difficulties and the shared experience to handle various problems should they arise. The translation and adaptation of an instrument can be challenging and demanding to achieve, but essential to the scientific accuracy of the research and crucial in overcoming our current limitations in producing culturally sensitive instruments.

Bibliography

- Alegría, M., Canino, G., Rios, R., Vera, M., Calderón, J., Rusch, D., Ortega, A. N. (2002). Inequalities in use of specialty mental health services among Latinos, African Americans, and non-Latino whites. *Psychiatric Services*, 53(12), 1547-55.
- Allen, M. J., & Yen, W. M. (1979). *Introduction to measurement theory*. Brooks/Cole Publishing Company, a Division of Wadsworth, Inc. California.
- Beiser, M. (1990). *Flower of two soils: Final report*. Reported submitted for NIMH Grant No. 5 – ROI-MH96678 and Canada Health and Welfare NHRDP Grant No. 6610-1322-04.
- Berkanovic, E. (1980). The effect of inadequate language translation on Hispanics' responses to health surveys. *American Journal of Public Health*, 70, 1273-1281.
- Berry, J. (1969). On cross-cultural comparability. *International Journal of Psychology*, 4, 119-128.
- Bravo, M. (2003). Instrument Development: Cultural Adaptations for Ethnic Minority Research. In G. Bernal, J. E. Trimble, A. K. Burlew & F.T. Leong (Eds.), *Handbook of Racial and Ethnic Minority Psychology*. Thousand Oaks, CA: Sage Publications, Inc.
- Bravo, M., Canino, G., Rubio-Stipec, M., & Woodbury, M. (1991). A cross-cultural adaptation of a diagnostic instrument: the DIS adaptation in Puerto Rico. *Culture, Medicine and Psychiatry*, 15, 1-18.
- Bravo, M., Woodbury-Fariña, M., Canino, G., & Rubio-Stipec, M. (1993). The Spanish translation and cultural adaptation of the Diagnostic Interview Schedule for Children (DISC) in Puerto Rico. *Cultural, Medicine and Psychiatry*, 17(3), 329-344.
- Brislin, R. W. (1970). Back-translation for cross-cultural research. *Journal of Cross-Cultural Psychology*, 1, 187-16.
- Brislin, R. W. (1986). The wording and translation of research instruments. In W. L. Lonner & J. W. Berry (Eds.), *Field Methods in Cross-Cultural Research*. (pp.137-164). Newbury Park, CA: Sage.
- Brislin, R. W., Lonner, W., & Thorndike, R. (1973). *Cross-Cultural Methods*. Publication John Wiley and Sons, New York.
- Canino, G., Guarnaccia, P. (1997). Methodological challenges in the Assessment of Hispanic children and adolescents. *Applied Development & Sciences*, 1(3), 124-134.
- Canino, G., Lewis Fernández, R., Bravo, M. (1997). Methodological challenges in cross-cultural mental health research. *Transcultural Psychiatric and Research Review*, 34(2), 163-184.

- Canino, G., Bird, H. R., Rubio-Stipec, M., Woodbury, M., Ribera, J. C., Huertas, S., & Sesman, S. (1987). Reliability of Child Diagnosis in a Hispanic Sample. *Journal of the American Academy of Child and Adolescent Psychiatry*, 26, 560-565.
- Canino, G., Bravo, M. (1994). The adaptation and testing of diagnostic and outcome measures for cross cultural research. *International Review of Psychiatry*, 6, 281-286.
- Canino, G., Canino, I. A., Bravo, M. (1994). Diagnostic assessment with Hispanic children. *Sociotam*, Vol. IV, 29-41.
- Canino, G., Bravo, M., Ramírez, R., Febo, V. E., Rubio-Stipec, M., Lewis-Fernández, F., Hasin, D., & Grant, B. (1999). The Spanish Alcohol Use Disorder and Associated Disabilities Interview Schedule (AUDADIS): Reliability and concordance with clinical diagnoses in a Hispanic population. *Journal of Studies on Alcohol*, 60, 790-799.
- Chow, J. C., Jaffee, K., Snowden, L. (2003). Racial/Ethnic Disparities in the Use of Mental Health Services in Poverty Areas. *American Journal of Public Health*, 93(5), 792-797.
- Draguns, J. G. (1980). Psychological disorder of clinical severity. *Handbook of Cross Cultural Psychology, Psychopathology*. VI. Boston: Allyn and Bacon.
- Flaherty, J. A. (1987). Appropriate and inappropriate research methodologies for Hispanic mental health. In *Health and Behavior: Research Agenda for Hispanics*. Gaviria, M., eds. Pp 177-186. Chicago: University of Illinois Press.
- Flaherty, J. A., Pathak, D., Mitchell, T., Wintrob, R., Richman, J. A., & Birz, S. (1988). Developing instruments for cross-cultural psychiatric research. *Journal of Nervous and Mental Disease*, 176, 257-63.
- Flaherty, L. T., Garrison, E. G., Waxman, R., Uris, P. F., Keys, S. G., Glass-Siegel, M., & Weist, M. D. (1998). Optimizing the roles of school mental health professionals. *Journal of Schizophrenic and Health*, 68(10), 420-4.
- Gaviria, M., Pathak, D. S., Mitchell, T., Flaherty, J. A., Winthrop, R. M., Martínez, H., García-Pacheco, C., Richman, J., & Birz, S. (1985). *Developing instruments for cross-cultural research*. Paper presented at the American Psychiatric Convention, Dallas, Texas.
- Geisinger, K. F. (1994). Cross-cultural normative assessment: translation and adaptation issues influencing the normative interpretation of assessment instruments. *Psychological Assessment*, 6, 304-12.
- Guarnaccia, P. J. (1996). Anthropological perspectives: The importance of culture in the assessment of quality of life. In *Quality of Life and Pharmacoeconomics in Clinical Trials*. Spilker, B., eds. Chapter 55. Philadelphia: Lippincott-Raven Publishers.

- Guarnaccia, P. J., Rivera, M., Franco, F., & Neighbors, C. (1996). The experiences of ataques de nervios: towards an anthropology of emotions in Puerto Rico. *Culture, Medicine and Psychiatry*, 20, 343-67.
- Hambleton, R. K. (2000). Emergence of item response modeling in instrument development and data analysis. *Medical Care*, 38, (9 Suppl): II60-5.
- Hambleton, R. K., Swaminathan, H., & Rogers, H. J. (1991). Fundamentals of item response theory. Newbury Park, CA: Sage.
- Hilton, A., Skrutkowsky, M. (2002). Translating instruments into other languages: development and testing process. *Cancer Nursing*, 25, 1-7.
- Jones, P. S., Lee, J. W., Phillips, L. R., Zhang, X. E., Jaceldo, K. B. (2001). An adaptation of Brislin's Translation Model for cross-cultural research. *Nursing Research*, 50(5), 300-304.
- Kessler, R. C., McGonagle, K. A., Zhao, S., Nelson, C. B., Huges, M., Eshleman, S., Wittchen, H.U., & Kendler, K. S. (1994). Lifetime and 12month prevalence of DSM III R psychiatric disorders in the United States: Results from the National Comorbidity Survey. *Archives General Psychiatry*, 51, 8-19.
- Kleinman, A., Good, B. J. (1985). *Culture and Depression*. Berkeley: University of California Press.
- Kreuger, R. A. (2000). *Focus groups: a practical guide for applied research*, 3th. Edition. Sage Publications.
- Lehman, A. F. (1988). A quality of life interview for the chronically mentally ill. *Evaluating and Program Planning*, 11, 51-62.
- Lewis-Fernandez, R., Guarnaccia, P. J., Martinez, I. E., Salman, E., Schmidt, A., & Liebowitz, M. (2002). Comparative phenomenology of ataques de nervios, panic attacks, and panic disorder. *Culture, Medicine and Psychiatry*, 26, 199-223.
- Lewis-Fernández, R., & Kleinman, A. (1995). Cultural psychiatry: Theoretical, clinical, and research issues. *Psychiatric Clinics of North America*, 18, 433-48.
- Lopez, S. R., & Guarnaccia, P. J. (2000). Cultural psychopathology: uncovering the social world of mental illness. *Annuals Review of Psychology*, 51, 571-98.
- Manson, S. M., James, H., Shore, A., Baron, E., Ackerson, L., & Neligh, G. (1992). Alcohol abuse and dependence among American Indians. In *Alcoholism -North America, Europe and Asia: A Coordinated Analysis of Population Data from Ten Regions*. John Helzer and Glorisa Canino, eds. (pp. 113-130). London, England:Oxford Press.
- Marin, G. I., & Vanoss Marin, B. A. (1991). *Research with Hispanic Populations –Applied Social Research Methods Series Vol 23*, Newbury Park, CA: Sage Publications.

- Matías-Carrelo, L., Chavez, L. M., Negrón, G., Canino, G., Aguilar-Gaxiola, S., Hoppe, S. (2003). The Spanish translation and cultural adaptation of five outcome measures. *Culture, Medicine and Psychiatry*, 27, 291-313.
- Morgan, D. L., & Krueger, R. A. (1998). *The focus group kit*. Sage Publications.
- New Freedom Commission on Mental Health. (2003). *Achieving the Promise: Transforming Mental Health Care in America. Final Report*. DHHS Pub. No. SMA-03-3832. Rockville, MD.
- Phillips, L. R., Luna, I., Russell, C. K., Baca, G., Lim, Y. M., Cromwell, S. L., & Torres de Ardon, E. (1996) Toward a cross-cultural perspective of family caregiving. *West Journal of Nursing and Research*, 18, 236-51.
- Reinhard, S. C., Gubman, G. D., Horwitz, A. V., Minsky, S. (1994). Burden Assessment Scale for families of the seriously mentally ill. *Evaluation and Program Planning*, 1, 261-269
- Reise, S. P., Widaman, K. F., & Pugh, R. H. (1993). Confirmatory factor analysis and item response theory: two approaches for exploring measurement invariance. *Psychological Bulletin*, 114(3), 552-556.
- Rogler, L. H. (1999a). Implementing cultural sensitivity in mental health research: Convergence and new directions, Part I., *Psychline*, 3(1), 5-11.
- Rogler, L. H. (1999b). Methodological sources of cultural insensitivity in mental health research. *American Psychology*, 54(6), 424-33.
- Rubio-Stipek, M., Bird, H., Canino, G., Gould, M. (1990). The Internal Consistency and Concurrent Validity of a Spanish Translation of the Child Behavior Checklist. *Journal of Abnormal Child Psychology*, 18(4), 393-406.
- Shaffer, D., Gould, M. S., Brasic, J., Ambrosini, P., Fisher, P., Bird, H., & Aluwahlia, S. (1983). A Children's Global Assessment Scale (C-GAS). *Archives of General Psychiatry*, 40, 1228-1231.
- Smedley, B. D., Stith, A. Y. & Nelson, A. R. (Eds.). (2003). *Unequal Treatment: Confronting Racial and Ethnic Disparities in Health Care*. Washington, D.C: National Academy Press.
- United States Public Health Service Office of the Surgeon General (2001). *Mental Health: Culture, Race, and Ethnicity: A Supplement to Mental Health: A Report of the Surgeon General*. Rockville, MD: Department of Health and Human Services, U.S., Public Health Service.
- Van de Vijver, F., & Leung, K. (1996). Methods and data analysis of comparative research. In J. W. Berry, Y. H. Poortinga, & J. Pandey (Eds.), *Handbook of Cross-Cultural Psychology* (pp 257-298). Boston, MA: Allyn and Bacon.
- Vázquez Barquero, J. L., Vázquez Bourgon, E., Herrera Castanedo, S, Saiz, J., Uniarte, M., Morales, F., Gaité, L., Herran, A., & Ustun, T. B. (2000). Spanish version of the New World Health

- Organization Disability Assessment Schedule II (WHO-DAS II) initial phase of development and pilot study. (Cantabria Disability Group). *Actas Española Psiquiátrica* 28(2), 77-88.
- Ware, N. C., Tugenberg, T., Dickey, B., & McHorney, C. A. (1999). An ethnographic study of the meaning of continuity of care in mental health services. *Psychiatric Services*; 50, 395-400.
- Ware, N. C., Dickey, B., Tugenberg, T., McHorney, C. A. (2003). CONNECT: A measure of continuity of care in mental health services. *Mental Health Services Research*, 5(4), 209-221.
- Weidmer, B., Brown, J., & Garcia, L. (1999). Translating the CAHPS™ 1.0 survey instruments into Spanish. *Medical Care*, 37, MS89-MS96.
- World Health Organization. (2000). Disability Assessment Schedule: WHODAS II: Phase 2 Field Trials - Health Services Research, 36-Item Interviewer Administered, Day Codes Version. Geneva, Switzerland: World Health Organization.

Appendices

APPENDIX A - Burden Assessment Scale

APPENDIX B - Family Burden Scale

APPENDIX C - Lehman's Quality of Life Interview

APPENDIX D - Example of Difficult Word/Phrases Dictionary

APPENDIX E - Example of List of "Non-consensus" Words

APPENDIX F - Project A - First Year Timeline

Appendix A					
Burden Assessment Scale					
Items in English and Spanish					
I am going to read a list of things which other people have found to happen to them because of their relative's illness. Would you tell me to what extent you have had any of the following experiences in the past six months.					
<i>Voy a leerle una lista de preguntas acerca de situaciones que le han ocurrido a personas que tienen familiares con problemas de salud mental. Por favor, díganos si durante los últimos seis meses, debido a la enfermedad mental o de los nervios de su familiar usted:</i>					
Rating Scale:	1 = Not at all	2 = A little	3 = Some	4 = A lot	5 = NA
	<i>1 = Nada</i>	<i>2 = Poco</i>	<i>3 = Algo</i>	<i>4 = Mucho</i>	<i>5 = NA</i>
Original Items					
1.	Had financial problems <i>¿Ha tenido problemas económicos?</i>				
2.	Missed days at work (or school) <i>¿Ha tenido que faltar con regularidad a ciertas actividades programadas (trabajo, escuela, trabajo voluntario, citas médicas, etc.?)</i>				
3.	Found it difficult to concentrate on your own activities <i>¿Le ha costado trabajo concentrarse en sus actividades?</i>				
4.	Had to change your personal plans like taking a new job, or going on vacation <i>¿Ha tenido que cambiar sus planes personales, como por ejemplo, el aceptar un nuevo empleo o irse de vacaciones?</i>				
5.	Cut down on leisure time <i>¿Ha tenido que reducir su tiempo libre?</i>				
6.	Found the household routine was upset <i>¿Ha sentido que el trabajo diario de la casa le molesta?</i>				
7.	Had less time to spend with friends <i>¿Ha tenido menos tiempo para reunirse con sus amigos?</i>				
8.	Neglected other family members' needs <i>¿Ha descuidado las necesidades de otros miembros de la familia?</i>				
9.	Experienced family frictions and arguments <i>¿Ha tenido desacuerdos y discusiones con la familia?</i>				
10.	Experienced frictions with neighbors, friends, or relatives outside the home <i>¿Ha tenido desacuerdos y discusiones con vecinos, amigos(as) o parientes que no viven en su casa?</i>				
11.	Became embarrassed because of (relative name's) behavior <i>¿Se ha sentido incómodo(a) por el comportamiento de su familiar?</i>				
12.	Felt guilty because you were not doing enough to help <i>¿Se ha sentido culpable porque no ha hecho lo suficiente para ayudar a su familiar?</i>				
13.	Felt guilty because you felt responsible for causing (relative name's) problem <i>¿Se ha sentido culpable porque se siente el/la causante de la condición de salud de su familiar?</i>				
14.	Resented (relative name's) because he/she made too many demands on you <i>¿Le tiene resentimiento a su familiar porque ha exigido demasiado de usted?</i>				
15.	Felt trapped by your caregiving role <i>¿Se ha sentido atrapado(a) por la responsabilidad que representa el cuidar a su familiar?</i>				
16.	Were upset about how much (relative name's) had changed from his or her former self <i>¿Se ha sentido molesto(a) por el cambio de personalidad que ha sufrido su familiar?</i>				
17.	Worried about how your behavior with (relative name's) might make the illness worse <i>¿Se ha preocupado acerca de cómo el comportamiento de usted puede empeorar la condición de salud de su familiar?</i>				
18.	Worried about what the future holds for (relative name's) <i>¿Se ha preocupado acerca del futuro de su familiar?</i>				

Appendix A	
Burden Assessment Scale	
Items in English and Spanish	
19.	Found the stigma of the illness upsetting <i>¿En general, le ha molestado la enfermedad de su familiar y sus consecuencias?</i>
20.	Had your financial security threatened <i>¿Ha visto amenazada su seguridad económica?</i>
Added Items *	
21.	Have you felt tired, fatigued or had other physical problems? <i>¿Ha sentido cansancio físico, fatiga u otros problemas físicos?</i>
22.	Have you felt alone? <i>¿Se ha sentido solo(a)?</i>
23.	Have you felt that the health professionals/specialists that treat (<i>relative name's</i>) have been available to speak with you? <i>¿Ha sentido que los profesionales/especialistas de la salud que atienden a su familiar han estado disponibles para hablar con usted?</i>
24.	Have you felt that your relative has received the mental health services he/she needs? <i>¿Ha sentido que su familiar ha recibido los servicios de salud mental que necesita?</i>
25.	Have you developed an emotional or nervous problem? <i>¿Le ha causado algún problema emocional o de los nervios?</i>
26.	Have you felt physically threatened by (<i>relative name's</i>) aggressiveness? <i>¿Se ha sentido amenazado físicamente por la agresividad de su familiar?</i>

* The first five added items for the Burden Assessment Scale, developed by Dr. Susan Reinhard and Dr. Allan Horowitz, were included as a result of a previous Spanish adaptation. The last two questions were added as a result of the work conducted by Matias-Carrelo et al., 2003.

Appendix B	
Family Burden Scale	
Items	
Original Items	
<p>1. The next questions are about how <u>your</u> life is affected by the health problems of your (RELATIVE/S). Taking into consideration your time, energy, emotions, finances, and daily activities, would you say that (his/her/their) health problems affect your life a lot, some, a little, or not at all?</p> <p><i>Las siguientes preguntas se refieren a cómo afectan <u>su vida</u> los problemas de salud de su(s) (FAMILIAR/ES). Teniendo en cuenta su tiempo, energía, emociones, economía y actividades diarias, ¿diría que los problemas de salud de su(s) familiar(es) afectan su vida --mucho, regular, un poco, nada?</i></p>	
Response Scale for Q1:	1 = A lot 2 = Some, 3 = A little 4 = Not at all 8 = Don't Know 9 = Refused <i>1 = Mucho 2 = Regular 3 = Un poco 4 = Nada 8 = No sabe 9 = Rehúsa</i>
<p>2. Do you do any of the following things for (him/her/they) because of these health problems over and above what you normally would do:</p> <p><i>Debido a los problemas de salud de sus familiares, ¿hace usted alguna de las siguientes cosas, además de lo que haría normalmente?</i></p>	
<p>2a. Do you help (him/her/they) with washing, dressing, or eating?</p> <p><i>¿Le(s) ayuda a <u>bañarse</u>, <u>vestirse</u> o <u>comer</u>?</i></p>	
<p>2b. Do you help (him/her/they) with practical things, like paper work, getting around, housework, or taking medications?</p> <p><i>¿Le(s) ayuda en cosas prácticas, como el papeleo, el moverse de un lugar a otro, la limpieza de la casa o la toma de medicamentos?</i></p>	
<p>2c. Do you spend more time keeping (him/her/they) company or giving emotional support, than you would if the health problems didn't exist?</p> <p><i>¿Dedica usted más tiempo a hacerle(s) compañía o a darle(s) apoyo emocional de lo que haría si no tuviera(n) problemas de salud?</i></p>	
Response Scale for Q2a-2c:	1 = Yes 2 = No 8 = Don't Know 9 = Refused <i>1 = Sí 2 = No 8 = No sabe 9 = Rehúsa</i>
<p>AT LEAST ONE "YES" RESPONSE IN 2A-2C. Go to question 4. <i>AL MENOS UNA RESPUESTA AFIRMATIVA EN 2A-2C. Pase a la pregunta 4.</i></p>	
<p>3. Do you spend any time doing <u>other</u> things related to (his/her/their) health problems?</p> <p><i>¿Dedica tiempo a hacer <u>otras</u> cosas relacionadas con los problemas de salud de su(s) familiar(es), por ejemplo: comprar medicinas, llevarlo(s) a citas médicas, llevarlo(s) a actividades especiales?</i></p>	
Response Scale for Q3:	1 = Yes 2 = No 8 = Don't Know 9 = Refused <i>1 = Sí 2 = No 8 = No sabe 9 = Rehúsa</i>
<p>4. About how much time in an <u>average week</u> do you spend doing things related to (his/her/their) health problems? _____ Hours per Week</p> <p><i>Usualmente, ¿cuánto tiempo dedica por semana a asuntos relacionados con la salud de su(s) familiar(es)? _____ Horas por Semana</i></p>	
<p>5. How much do (his/her/their) health problems cause you <u>embarrassment</u> – a lot, some, a little, or not at all?</p> <p><i>¿Qué tanta/cuánta incomodidad le causan los problemas de salud de su(s) familiar(es) --mucho, regular, un poco o nada?</i></p>	

Appendix B	
Family Burden Scale	
Items	
6.	<p>How much do (his/her/their) health problems cause you to be <u>worried, anxious, or depressed</u> – a lot, some, a little, or not at all?</p> <p><i>¿Qué tanta/Cuánta <u>preocupación, ansiedad o depresión</u> le causan los problemas de salud de su(s) familiar(es) --mucho, regular, un poco o nada?</i></p>
Response Scale for Q6:	<p>1 = A lot 2 = Some 3 = A little 4 = Not at all 8 = Don't Know 9 = Refused</p> <p><i>1 = Mucho 2 = Regular 3 = Un poco 4 = Nada 8 = No sabe, 9 = Rehúsa</i></p>
7.	<p>Do (his/her/their) health problems have any financial cost to you either in terms of money you spend because of the problems or earnings you lose?</p> <p><i>¿Representan para usted un <u>costo económico</u> los problemas de salud de su(s) familiar(es)? Piense tanto en el dinero que pueda gastar debido a estos problemas como en los ingresos que deja de ganar.</i></p>
Response Scale for Q7:	<p>1 = Yes 2 = No 8 = Don't Know 9 = Refused</p> <p><i>1 = Sí 2 = No 8 = No sabe 9 = Rehúsa</i></p>
7a.	<p>About how much money did (his/her/their) health problems cost you in an <u>average month</u> over the past year? \$_____ per month</p> <p><i>Durante el año pasado, ¿más o menos cuánto gastó al mes usted por los problemas de salud de su(s) familiar(es)? \$_____ por mes</i></p>
Response Scale for Q7a	<p>8 = Don't Know 9 = Refused</p> <p><i>8 = No sabe 9 = Rehúsa</i></p>
New Items*	
8.	<p>Would you say that your relative/s health problems cost you</p> <p><i>Diría usted que los problemas de salud de su(s) familiar(es) le costaron</i></p>
Response Scale for Q8:	<p>1= a lot of money 2= a moderate amount of money 3=Little money 4= No money</p> <p>8= Don't know 9= Refused</p> <p><i>1 = Mucho dinero; 2 = Una cantidad moderada de dinero; 3 = Poco dinero, 4 = Nada, 8 = No sabe, 9 = Rehúsa</i></p>

Appendix B	
Family Burden Scale	
Items	
<p>9. Would you say that as a result of your relative's problems you have spent with them</p> <p style="text-align: center;"><i>Diría usted que debido a los problemas de salud de su(s) familiar(es), le(s) dedicó a este(os)</i></p>	
Response Scale for Q9:	<p>1= All your time 2=A lot of your time 3= Part of your time 4=Little time 5= No time 8= Does not know 9= Refused</p> <p><i>1 = Todo el tiempo; 2 = Mucho tiempo; 3 = Parte del tiempo; 4 = Poco tiempo; 5 = Ningún tiempo; 8 = No sabe; 9 = Rehúsa</i></p>
<p>10. How long have you been taking care or helping of your relative/s, in other words, doing things for (him/her/them) over and above what you normally would do for someone who lives with you?</p> <p style="text-align: center;"><i>¿Cuánto tiempo ha estado cuidando o ayudando a su(s) familiar(es), es decir, hacer cosas por él/ella/ellos/ellas además de las que haría normalmente por alguien que viva con usted?</i></p>	
Response Scale for Q10:	<p>1= Less than 6 months 2= From 6months to a year 3=1 to 3 years 4= 3 to 5 years 5= 5 to 10 years; 6=10 to 15 years; 7= 15 to 20 years; 8= more than 20 years</p> <p><i>1 = Menos de 6 meses; 2 = De 6 meses a 1 año; 3 = De 1 a 3 años; 4 = De 3-5 años 5 = De 5 a 10 años; 6 = De 10 a 15 años; 7 =De 15 a 20 años; 8 = Más de 20 años</i></p>

* Original items were developed by Dr. Ronald Kessler. The last three items were added as a result of the work conducted by Matias-Carrelo et al., 2003.

Appendix C	
Items for Lehman's Quality of Life Interview	
Scales Name	Items
(Subjective Scales)	How do you feel about: <i>¿Cómo se siente usted:</i>
General Quality of Life	1. Your life in general? <i>¿Con su vida en general?</i> [This question is given twice; at the beginning and at the end of the interview.]
Living Situation	1. The living arrangements where you live? <i>¿Sus condiciones de vivienda?</i> 2. The privacy you have there? <i>¿La privacidad que tiene allí?</i> 3. The prospect of staying on where you currently live for a long period of time? <i>¿La posibilidad de quedarse en donde vive actualmente por mucho tiempo?</i>
Leisure	1. The way you spend your spare time? <i>¿La forma en que usa su tiempo libre?</i> 2. The chance you have to enjoy pleasant or beautiful things? <i>¿La oportunidad que tiene para disfrutar las cosas agradables y lindas de la vida?</i> 3. The amount of fun you have? <i>¿Cuánto/qué tanto se divierte?</i> 4. The amount of relaxation in your life? <i>¿Cuánto/qué tanto se relaja o descansa?</i>
Family Relations	1. The way you and your family act toward each other? <i>¿La relación entre usted y su familia?</i> 2. The way things are in general between you and your family? <i>¿Cómo van las cosas en general, entre usted y su familia?</i>
Social Relations	1. The things you do with other people? <i>¿Las cosas que usted hace con otras personas?</i> 2. The amount of time you spend with other people? <i>¿El tiempo que pasa con otras personas?</i> 3. The people you see socially? <i>¿Las personas con las que se relaciona socialmente?</i>
Finances	1. The amount of money you get? <i>¿La cantidad de dinero que usted recibe?</i> 2. How comfortable and well-off you are financially? <i>¿Su situación económica?</i> 3. The amount of money you have available to spend for fun? <i>¿La cantidad de dinero que tiene disponible para gastar en diversiones, como ir al cine, a pasear, etc.?</i>
Work	1. Your job? <i>¿Su trabajo?</i> 2. What it is like where you work (the physical surroundings) <i>¿El lugar o el área donde usted trabaja?</i> 3. The amount you get paid? <i>¿El sueldo que gana?</i>

Appendix C	
Items for Lehman's Quality of Life Interview	
Safety	
	<ol style="list-style-type: none"> 1. How safe you are on the streets in your neighborhood? <i>¿La seguridad en las calles de su vecindario?</i> 2. How safe you are where you live? <i>¿La seguridad en el sitio donde vive?</i> 3. The protection you have against being robbed or attacked? <i>¿La protección que usted tiene contra robos o asaltos?</i>
Health	
	<ol style="list-style-type: none"> 1. Your health in general? <i>¿Su salud en general?</i> 2. Your physical condition? <i>¿Su condición física?</i> 3. Your emotional well-being? <i>¿Su bienestar emocional, salud mental?</i>
Living Situation (new items)	
	<ol style="list-style-type: none"> 1. Your relationship with your neighbors? <i>¿Sus relaciones con los vecinos?</i> 2. Your neighborhood physical environment? (For example, unnecessary noise from engines, cars, radios, airplanes; with trash in the surrounding areas, etc.) <i>¿El ambiente físico de su vecindario? (Por ejemplo, ruidos innecesarios de motores, carros, radios, aviones, con la basura alrededor, etc.)</i>
Subjective Rating Scale:	<p>1 = Terrible, 2 = Unhappy, 3 = Mostly Dissatisfied, 4 = Mixed, 5 = Mostly Satisfied, 6 = Pleased, 7 = Delighted (1 = Terriblemente mal, 2 = Muy Descontento(a), 3 = Insatisfecho(a), 4 = Ni Bien ni Mal, 5 = Satisfecho(a), 6 = Muy Complacido(a), 7 = Fascinado(a))</p>
Objective Scales	
Leisure	
	<ol style="list-style-type: none"> 1. Go for a walk? <i>¿Salió a caminar?</i> 2. Go shopping? <i>¿Salió de compras?</i> 3. Go to a restaurant or coffee shop? <i>¿Fue a un restaurante o a un café?</i> 4. Read a book, magazine, or newspaper? <i>¿Leyó un libro, una revista o un periódico?</i> 5. Go for a ride in a bus or car? <i>¿Salió a pasear en autobús o en carro/auto?</i> 6. Work on a hobby? <i>¿Realizó algún pasatiempo?</i> 7. Play a sport? <i>¿Jugó algún deporte?</i> 8. Go to a park? <i>(Fue al parque?)</i>

Appendix C	
Items for Lehman's Quality of Life Interview	
Rating Scale:	<i>0 = No, 1 = Yes</i> <i>0 = No, 1 = Si</i>
Family Contacts	
	1. In the past year, how often did you talk to a member of your family on the telephone? <i>Durante el último año, ¿cuántas veces habló por teléfono con un miembro de su familia?</i> 2. In the past year, how often did you get together with a member of your family? <i>Durante el último año, ¿cuántas veces se reunió/compartió con un miembro de su familia?</i>
Social Contacts	
	1. Visit with someone who does not live with you? <i>¿Visita a alguien que no vive con usted?</i> 2. Telephone someone who does not live with you? <i>¿Llama por teléfono a alguien que no vive con usted?</i> 3. Do something with another person that you planned ahead of time? <i>¿Hace algo que había planificado con otra persona?</i> 4. Spend time with someone you consider more than a friend, like a spouse, a boyfriend or a girlfriend? <i>¿Pasa algún tiempo con alguien a quien considera algo más que un(a) amigo(a), como por ejemplo, esposo(a), un(a) novio(a)?</i>
Rating Scale:	<i>1 = Not at all, 2 = Less than once a month, 3 = At least once a month, 4 = At least once a day, 5 = At least once a day</i> <i>(1 = Nunca, 2 = Menos de una vez al mes, 3 = Al menos una al mes, 4 = al menos una vez a la semana, 5 = Al menos una vez al día)</i>
Finances	
	1. Food? <i>¿Alimentos?</i> 2. Clothing? <i>¿Ropa?</i> 3. Housing? <i>¿Vivienda?</i> 4. Traveling around the city for things like shopping, medical appointments, or visiting friends and relatives? <i>¿Salidas para hacer cosas como ir de compras, a citas médicas, o visitar familiares y amigos?</i> 5. Social activities like movies or eating in restaurants? <i>¿Actividades sociales como ir al cine o comer en restaurantes?</i>
Leisure (new items)	
	1. Listened to music? <i>¿Oyó/escuchó música?</i> 2. Had lunch or met with friends? <i>¿Almorzó o se reunió con sus amistades?</i> 3. Went to the movies? <i>¿Fue al cine?</i>
Rating Scale:	<i>0 = No, 1 = Yes</i> <i>0 = No, 1 = Si</i>

Note: The new items were added as a result of the work conducted by Matias-Carrelo et al., 2003.

Appendix D

Example of Difficult Word/Phrases Dictionary

English	Spanish Translation
Disturbance	perturbación/alteración
Functioning	funcionamiento
symptom bouts	episodio
confidence codings	códigos de margen de error
degree of confidence	margen de error
Placement	colocación
Displeasure	desagrado
Physical	castigo físico o corporal
blank and purposeless thought	pensamientos que no conducen a nada y sin propósito
intrusive thought	pensamientos inoportunos
Anhedonia	pérdida de la capacidad de expresar placer
Intrusive	intromisión
Restlessness	intranquilidad
calling out	da respuestas precipitadas
stun gun mace BB gun	arma que inmoviliza gas lacrimógeno pistola de calibre pequeño
job corps	programa de empleos para jóvenes
follow up home studies	evaluación de seguimiento en el hogar
dull perception	percepción difusa
symptom dependence	síntomas responsables de la incapacidad

For the content of Appendix E we want to acknowledge the work and contributions of the Spanish-speaking Network on Disabilities; A group of international experts from the Colombia, Chile, Mexico, Panama, Puerto Rico, and Spain who originally translated the WHO-DAS II into Spanish.

Appendix E

Example of List of “Non-consensus” Words

Lista de Términos Incluidos en el Borrador β -1 de la CIDAP-2, que Plantean Problemas² en su Traducción al Español

**ICIDH-2 β -1 Draft
List of English Terms which are Problematic for Translation to Spanish**



Organización Mundial de la Salud
Ginebra, 1999

² Los problemas se derivan de la ausencia de términos equivalentes en Español, o de la variación lingüística entre los distintos países de habla hispana.

The problems arise from the lack of equivalent Spanish terms, or the linguistic variation among the different Spanish speaking countries.

Red de Habla Hispana en Discapacidades
- RHHH-

INTERPRETACIÓN DE LA TABLA DE TÉRMINOS PROBLEMÁTICOS

La tabla de términos problemáticos incluidos en el borrador Beta-1 de la CIDAP-2, se divide en tres columnas:

Columna A: Lista de términos de la versión original en Inglés del borrador Beta-1 de la ICIDH-2, que causaron algún tipo de problema al ser traducidos al Español. Una (D) indica que el término original en Inglés es un “coloquialismo”, excesivamente sofisticado, o específico de un grupo/cultura, y se sugiere su eliminación.

Columna B: Términos alternativos en Español, sugeridos por los miembros de los diferentes países de habla hispana durante el proceso de traducción.

Columna C: Término seleccionado en la Conferencia de Consenso entre los representantes de distintos países de habla hispana. El término es elegido por ser el más adecuado dentro del contexto y el de uso más universal.

Aspectos a tener en cuenta en esta columna:

1. El código (A) indica que se deben incluir en la traducción, todos los términos seleccionados debido a diferencias lingüísticas entre países y a la ausencia de un único término universal en Español.
2. El código (B) indica que el término seleccionado tiene un significado más restringido que el original en Inglés y debería ir acompañado del término original entre comillas.
3. Cuando se sugiere más de un término, la selección final dependerá del contexto, teniendo en cuenta el orden de presentación, ya que el primero es considerado más aceptable que el segundo y así sucesivamente. En este caso se utiliza el código (C).

INTERPRETATION OF PROBLEMATIC TERMS TABLE

The table of English terms, in the ICIDH-2 beta-1 draft, which are problematic in being translated to Spanish, is divided in three columns:

Column A: List of English terms included in the ICIDH-2 beta-1 draft, which are problematic for translation to Spanish. The code (D) indicates that the English term is a “colloquialism”, too sophisticated, or culture/group specific, and it is suggested to be deleted.

Column B: Spanish alternatives suggested by members of different Spanish speaking countries/cultures, during the translation process.

Column C: Spanish term(s) selected as being more “common or universal” after consensus agreement between representatives of the different Spanish speaking countries/cultures, during the Consensus Conference. The coding in this column indicates the following:

1. The code (A) indicates the inclusion of all terms selected, due to linguistic differences among countries and the lack of one “universal” Spanish term.
2. The code (B) indicates that the selected term in Spanish has a more restricted meaning than the original in English, and should be followed by the original term quoted.
3. When more than one term is suggested, the selection will depend on the context, taking into consideration the order of presentation, thus the first term presented is preferable to the second and so on. The code for these cases is (C).

CIDAP-2: BORRADOR BETA-1

LISTA DE TÉRMINOS PROBLEMÁTICOS Y CON DIFÍCIL TRADUCCIÓN

ÁREA DE LA CIDAP-2: INTRODUCCIÓN

A Término Inglés English Term	B Términos Españoles Propuestos Proposed Spanish Terms	C Término seleccionado Selected Term
Health condition	Condición de salud/Estado de salud	Estado de salud; Condición de Salud (C)
Disablement	Discapacidad/Minusvalía/Impedimento Menoscabo/Inhabilitación/Minusvalidez	Discapacidad; Discapacitante (C)
Disorder	Trastorno/Enfermedad	Trastorno
Impairment	Deficiencia/Impedimento/Deterioro/ Daño	Deficiencia
Disability	Discapacidad/Incapacidad/Inhabilidad	Discapacidad
Handicap	Minusvalía/Desventaja/Impedimento	Desventaja
Contextual Factors	Factores contextuales (del contexto)	Factores contextuales
Qualifiers	Calificadores/Calificativos	Calificadores; Calificativos (C)
Facilitators	Facilitadores/Mediadores/Favorecedoresque facilita	Facilitadores/que facilitan (A)
Enhancers	Que mejorar/facilitan/favorecen	Que mejoran
Hindrances/Barriers	Barreras/Obstáculos/Impedimentos	Barreras; Obstáculos; Impedimentos (C)
Domain	Dominio/Campo/Área/Ambito	Campo; Área; Ambito (C)
Assistive Devices	Dispositivos de ayuda/Sistemas de apoyo/Ayudas técnicas/aparatos / instrumentos/equipos	Dispositivos de ayuda
Roles	Papeles/Roles	Roles/Papeles (A)
Sanitation of Items (D)	Saneamiento de ítems/Depuración de términos/Clarificación de términos	Depuración de términos
Environment	Entorno/Ambiente/Medio ambiente / Medio	Entorno; Ambiente; Medio ambiente; Medio (C)
Functioning	Funcionamiento/Función/Proceso funcional	Funcionamiento
Performance	Ejecución/realización/actuación/ Desempeño/Rendimiento	Rendimiento; desempeño; Ejecución (C)
Involvement	Compromiso/participación/ Involucración/ Involucramiento	Compromiso; Participación; Involucrase; Implicarse (C)
Scope	Alcance/Ambito/ Campo de actuación o aplicación	Alcance; Ambito;Campo de actuación (C)
Caveats	Advertencia/sugerencia/comentarios	Advertencia
Equalisation	Equiparación/Igualdad	Igualdad; Equiparación (C)
Operationalization	Operativización/Operacionalización	Operativización
Overlap	Solapamiento/Sobreposición/ Superposición	Superposición
Copying Styles	Estilos de Adaptarse/de enfrentamiento/ de afrontamiento/Maneras de afrontar	Estilos de afrontamiento /Maneras de afrontar los problemas (A) (B)

A Término Inglés English Term	B Términos Españoles Propuestos Proposed Spanish Terms	C Término seleccionado Selected Term
Social Background	Situación social/Antecedentes sociales/ Trasfondo social	Antecedentes sociales
Distress	Dolor/Ansiedad/Sufrimiento/Angustia	Angustia (B)
Envisaged	Concebida/Oferta	Concebida
Needs assessment	Evaluación de necesidades/Detección de Necesidades	Evaluación de necesidades; Detección de Necesidades (C)
Hindrances in society	Barreras en la sociedad/Barreras sociales	Barreras sociales
Health related experiences	Experiencias relacionadas con la salud	Experiencias relacionadas con la salud
To map (D)	Delimitar/Identificar/Ubicar/Señalar/ Trazar/Describir/Delinear/Mapear/ Representar	Delinear (B)
Building blocks (D)	Bases/Pilares	Bases (B)
Outcome evaluation	Evaluación de resultados/ Impacto/	Evaluación del Impacto; Evaluación de Resultados (B)
Surroundings	Entorno/Contorno/Alrededores	Entorno
One to one relationship (D)	Relación unívoca/cara a cara/emparejar/ Relación recíproca	Relación unívoca (B)
Severity	Severidad/Gravedad	Severidad
Outlook (D)	Punto de vista/ Previsión/ Pronóstico/Prognosis	Prognosis (B)
Feedback Form	Formulario de retroalimentación/de sugerencias/Hoja de comentarios	Formulario de retroalimentación; de sugerencias; Hoja de comentarios (C)
Threshold levels	Niveles mínimos/Umbrales	Umbrales
Functional test	Pruebas funcionales/Pruebas de funcionalidad	Pruebas de funcionalidad
Summary measurement	Resumen de medidas/Índice	Índice
Deprecated	Desaprobado/Descartado/Abandonado/ Rechazado	Descartado
Being teased	Rechazado/Fastidiado/Molestado/ Ridiculizado/Objeto de burla	Ridiculizado
Connotes	Connota/Denota	Connota
Issues	Aspectos/Asuntos/Cuestiones/Problemas	Asuntos; Aspectos (C)
Infirmity	Padecimiento/Enfermedad/Malestar/ Dolencia	Dolencia/Padecimiento (A)
Misuse	Mal uso/Mal usado/Uso incorrecto	Uso incorrecto
Awareness	Concienciación/Concientización	Concienciación
Monitor	Monitoreo/Seguimiento/Control	Seguimiento
Subnormal (D)	Subnormal/Retrasado/Por debajo del promedio/Retraso mental	Por debajo del promedio

ÁREA DE LA CIDAP-2: CLASIFICACIÓN DE DEFICIENCIAS

A Término Inglés English Term	B Términos Españoles Propuestos Proposed Spanish Terms	C Término seleccionado Selected Term
Pag. 153: Failure	Dificultad/Fracaso/Falla/Imposibilidad	Imposibilidad
I00510: Outgoing	Sociable/Abierto	Abierto
I00520: Agreeableness	Amabilidad/Afabilidad/	Amabilidad
I00520: Trusting	Confiado/confiable/	Confiado
I00530: Conscientiousness	Responsabilidad/Sensatez	Responsabilidad
I00530: Reliable	Confiable/Digno de confianza/Fiable	Digno de confianza/Fiable (A)
I00530: Planful	Meticuloso/Minucioso/	Meticuloso
I00600: Recorded	Registrado/Recogido/	Registrado
I00650: Craving	Ansia/Antojo/Deseo vehemente	Ansia
I00700: Insight	Autoconocimiento/Insight	Autoconocimiento (B)
I01000: Tune	Melodía/tono	Melodía
I01020: Encompassed by	Abarca/Cubre	Abarca
I01113: Environment	Medio ambiente/Entorno	Entorno
I01121: With the emotion of Anxiety	Con sentimiento de ansiedad/Con ansiedad	Con ansiedad
I01122: Restlessness	Inquietud/Desasosiego/Desesperación/ Impaciencia	Inquietud
I01200: Cross-sectional assessment	Evaluación transversal	Evaluación transversal
I01200 (5): In Keeping	En concordancia/En consonancia	En concordancia
I01200 (6): Dysregulation	Pérdida de control/Falta de regulación	Pérdida de control
I01240: Elation	Euforia/Exaltación del estado de ánimo	Euforia
I01300: Impinges	Estimula/Excita	Estimula

A Término Inglés <i>English Term</i>	B Términos Españoles Propuestos <i>Proposed Spanish Terms</i>	C Término seleccionado <i>Selected Term</i>
I01440: Ruminations	Rumiaciones/Pensamientos reiterativos	Pensamientos reiterativos
I01550: Driving force	Fuerza que impulsa/Fuerza que conduce/ Impulso	Impulso
I01600: Encompasses	Incluye/Encierra	Encierra
I01630,31,32: Integrative language functions	Funciones integrantes/integrativas/ integradas/del lenguaje	Funciones integrantes del lenguaje
I01920: Focusing	Focalizando/Enfocando/Fijación	Fijación
I10320: Interjections	Interjecciones/Exclamaciones	Exclamaciones
I10320: Stuttering Cluttering	Tartamudez/espasmofemia Verborrea/taquifemia	Tartamudez Verborrea
I20110: Adjust	Modifica/Ajusta	Modifica
I20200: Visual acuity of distant vision	Agudeza visual a larga distancia	Agudeza visual a larga distancia
I20300: Threading a needle	Enhebrar/Ensartar	Enhebrar
I20520: be sensed	Sentido/Percibido	Percibido
I30110: Astringent and Puckery (D)	Seco y amargo	Seco y amargo
I40530: Stamina	Vigor/Tolerancia/Resistencia	Vigor
I50130: Resorption	Resorción/Reabsorción	Reabsorción
I50200: Swallowing	Deglución/Tragar	Tragar
I50520: Globus feeling	Sensación de globo/Sensación de nudo en la garganta	Sensación de nudo en la garganta
I50630,40: Broken down	Degradadas/Descompuestas	Degradadas
I81600: Surmenage	Surmenage	Surmenage

ÁREA DE LA CIDAP-2: ACTIVIDADES

A Término Inglés English Term	B Términos Españoles Propuestos Proposed Spanish Terms	C Término seleccionado Selected Term
Pag. 125: Focus	Enfocarse/Centrarse/Focalizarse	Centrarse; Focalizarse (C)
Pag. 125: Therapist	Terapista/Terapeuta	Terapeuta
A10410: Following through	Dar seguimiento/Completar/Seguir/ Terminar	Seguir
A10500: Performing tasks	Realizar/Ejecutar/Desempeñar/tareas	Realizar tareas
A10621: Dealing	lidiar/Conducir/Manejar	lidiar; Manejar (C)
A10700: Sustaining performance	Manteniendo el desempeño/Ejecución prolongada/Mantener la ejecución	Mantener la ejecución
A10720: Psychological endurance	Fortaleza/Resistencia/Persistencia/ Psicológica	Fortaleza psicológica
A10820: Standards	Estándares/ Requisitos/Normas	Estándares
A10850: Operating	Operar/Funcionar	Funcionar
A20100: Sign language	lenguaje de signos/lenguaje de señas	lenguaje de signos/señas (A)
A20720: Computer	Computadora/Ordenador	Computadora
A30100: Being transported	Transportado/Trasladado	Trasladado
A30140: Toilet	Inodoro/Retrete/Utrete/Excusado/WC	Excusado/Inodoro (A)
A30210: Transferring oneself (D)	Transferirse/Desplazarse/Cambiar de lugar	Desplazarse; Cambiar de lugar (C)
A30410: Rough or smooth	Aspera o suave/Lisa o rugosa/Lisa o irregular	Lisa o irregular
420650: Clearing one's throat	Aclararse la garganta/Carraspear	Aclararse la garganta; Carraspear (C)
A30430: Skipping (D)	Saltar omitiendo un paso/Botar/Brincar/ Saltar a la comba	Saltar omitiendo un paso
A30630: Door Knob	Perilla/Tirador/Pomo/Picaporte	Tirador/Perilla/Picaporte (A)
A30720: Pulling	Tirar/Jalar	Tirar/Jalar (A)
A30840: Monitor	Monitoreando/Controlando/Siguiendo	Siguiendo
A30860: Carrying	llevar/Cargar/Transportar	llevar
A40140: Negotiating a single step (D)	Subir o bajar/Maniobrar escalón/acera/bordillo/Banqueta	Subir o bajar un escalón/ bordillo (A)
A40230: Playground equipment	Equipo recreativo/Equipo en el patio de recreo	Equipo en el patio de recreo
A40230,40: Climbing	Trepar/Subir o bajar	Subir o bajar
A40300: Moving around	Movilizarse/Moverse alrededor/ Desplazarse	Desplazarse
A40320: Grass	Hierva/Pasto/Césped	Césped
A40420: Traffic signs	Señales de tráfico/tránsito Señalamientos de tráfico/tránsito	Señales de tráfico
A40500: Powered/self powered	Esfuerzo externo o propio/Manual o eléctrico/ de motor	Manual o eléctrico; de motor (C)
A501 *: Groomed	Arreglado/Acicalado/Aliñado	Arreglado
A50100: Excretion hygiene	Higiene de la evacuación/excreción Aseo relacionado con la evacuación/ excreción	Aseo relacionado con la evacuación

A Término Inglés English Term	B Términos Españoles Propuestos Proposed Spanish Terms	C Término seleccionado Selected Term
A50110: Tub	Tina/Bañera	Tina/Bañera (A)
A50120: Taking a shower	Tomar un ducha/Ducharse	Ducharse
A50260: Removing	Remoción/Eliminación	Eliminación
A50260: Moisturising lotion	Loción humectante/Crema hidratante	Crema hidratante
A50270: Wiping	Limpiarse/Secarse	Limpiarse
A50400: Taking off	Sacarse/Quitarse	Quitarse
A50440: Fasteners	Dispositivos aseguradores/Cierres aseguradores	Cierres aseguradores
A50540: Cutlery	Servicios/Cubiertos	Cubiertos
A50562: Straw	Paja/Popote	Paja/Popote (A)
A50740: Plugs and power sockets (D)	Enchufes y soquetes	Enchufes
A60120: Dealing	Enfrentar/Manejar	Manejar
A60140: Heating	Calefaccionarse/Calentarse	Calentarse
A60170: Good condition	Buena condición/Buen estado	Buen estado
A60170: Maintenance	Mantención/Mantenimiento	Mantenimiento
A60200: Shelter	Vivienda/Alojamiento/Refugio/Lugar para alojarse	Vivienda
A60220: Furnishing	Amoblar/Amueblar	Amoblar/Amueblar (A)
A60250: Sunshades	Cobertores de sombra/Persianas	Persianas
A60310: Tools	Instrumentos/Herramientas	Herramientas
A60700: Possessions	Posesiones/Bienes/Elementos	Bienes
A70120: Communication activities	Actividades comunicacionales/de la comunicación	Actividades de la comunicación
A70140: Warmth	Calidez/Afecto	Afecto
A70160: Stamping (foot) (D)	Patear/Zapatear	Zapatear
A70170: Bowing	Reverencia/Abrazo	Reverencia
A70220: stand up for oneself	Estar por uno mismo/Valerse por uno mismo/Levantarse por uno mismo	Valerse por uno mismo
A70210: Balancing	Balance/Equilibrio	Equilibrio
A70210: Privacy	Privacidad/Intimidad	Privacidad/Intimidad (A)
A70620: Educational setting	Ambiente educacional/educativo	Ambiente educativo
A80250: Confined	Cerrado/circunscrito/limitado	Cerrado
A80431: Being monitored	Monitoreado/Supervisado	Supervisado
A80612: Outdoors	A la intemperie/Al aire libre	Al aire libre
A80670: Touring	Turistear/Hacer turismo	Hacer turismo
A91000: Recreation	Recreación/Ocio/Tiempo Libre	Recreación/Tiempo Libre (A)

ÁREA DE LA CIDAP-2: PARTICIPACIÓN

A Término Inglés English Term	B Términos Españoles Propuestos Proposed Spanish Terms	C Término seleccionado Selected Term
Pag. 197: Health care services	Servicios de atención de salud/Servicios de salud/Servicios sanitarios	Servicios de salud
Pag. 197: Raise issues	Enfatiza asuntos/Señala aspectos/ Pone en cuestión/Suscita la cuestión	Suscita; Pone en cuestión (C)
P00120: Nature and extent	Naturaleza y magnitud/extensión/ Alcance/Grado	Naturaleza y magnitud
P00120: Human waste	Desechos humanos/Excreciones humanas	Excreciones humanas
P00210: Alternative therapeutics	Terapias alternativas/alternas	Terapias alternativas
P00210: Rehabilitative therapeutic care	Cuidados de rehabilitación terapéutica/Tratamiento de rehabilitación/Terapia de rehabilitación	Terapia de rehabilitación
P00220: Involvement	Involucramiento/Participación	Participación
P00220: Ill-health condition	Enfermedad/Alteración del estado de salud	Alteración del estado de salud
P00220: Screening	Evaluación inicial/Cribaje/Despistaje/ Cernimiento	Evaluación inicial; Cribaje (C)
P00220: Regression	Regresión/Deterioro/Retroceso/	Retroceso
P00220: Fitness program (D)	Programa de acondicionamiento/ Preparación física	Programa de acondicionamiento/ preparación física (A)
P00300: Person's attainment	Lograr/Conseguir	Lograr
P00320: Parenteral nutrition	Nutrición parenteral/intravenosa	Nutrición parenteral
P00410: Homeless	Persona sin hogar/Ambulantes/Sin techo/Vagabundos	Personas sin hogar
P10200: Participation in mobility	Participación en la movilidad/en la actividad motora	Participación en el desplazamiento; en la movilidad (C)
P10300: Transportation	Transportación/Transporte	Transporte
P10320: Rickshaws (D) Jitneys (D)	Jinrikisha/Carro de culí Microbus	
P30400: Peers	Compañeros/Iguals/Pares	Compañeros
P40120: Enculturation (D)	Enculturación/Asimilación de la propia cultura	Enculturación/ Asimilación de la propia cultura (A)
P40200: Temporary	Temporero/Temporal	Temporal
P40200: Involve	Envolver/Implicar	Implicar
P40200: Unionized	Unionadas/Sindicales	Sindicales
P40210: Articling (D)	Contratado/Asalariado	Contratado
P40210: Training	Adiestramiento/Entrenamiento/ Preparación	Preparación
P40330: Crafts	Artes manuales/Manualidades	Manualidades
P40340: Coffee Clubs	Cafés/Tertulias	Tertulias
P50200: Assets	Fondos/Bienes	Fondos
P60210: Advocacy groups	Grupos de presión/Grupos pro-derechos/ Grupos de defensa/Grupos de iniciativa social	Grupos de presión; Grupos pro-derechos (C)
P60240: Coming of age parties (D)	Fiesta de mayoría de edad/Puesta de largo/Fiesta quinceañera	Fiesta de mayoría de edad

ÁREA DE LA CIDAP-2: FACTORES CONTEXTUALES

A Término Inglés English Term	B Términos Españoles Propuestos Proposed Spanish Terms	C Término seleccionado Selected Term
Pag. 229: Attitudinal environment	Entorno/Aspecto actitudinal	Aspecto actitudinal
E00310: Training	Adiestramiento/Entrenamiento/ Formación	Entrenamiento
E00320: Pantyhose	Mediabonbacha/calcetines	Calcetines
E00330: Transfer aids	Ayudas para desplazarse/ para transferencias	Ayudas para desplazarse
E00340: Conduct of tasks	Conducción/Ejecución/Realización de tareas	Realización de tareas
E00340: Modified	Modificados/Adaptados	Adaptados
E00360: Goods	Mercaderías/Mercancías	Mercaderías/Mercancías (A)
E00370: Improvement	Mejoramiento/Mejora/Para mejorar	Para mejorar
E00440: Household appliances	Aparatos para el hogar/ Electrodomésticos	Electrodomésticos
E20240: Support	Soporte/Asistencia	Asistencia
E20300: Expertise	Pericia/Especialización	Especialización
E20370: Apprenticeship	Aprendices/Programas de aprendizaje/ Escuelas de oficios	Escuelas de oficios
E20380: Continuing education	Continuidad en la educación/Educación continua	Educación continua
E20650: Regulatory system	Sistema regulatorio/Sistema legislativo	Sistema legislativo
E20750: Sewerage	Cloacas/Alcantarillado/Saneamiento	Alcantarillado
E30200: Attitudes	Posturas/Actitudes	Actitudes
E40220: Wildlife preserves	Reservas de vida salvaje/silvestre/ Reservas naturales	Reservas naturales

ÁREA DE LA CIDAP-2: APENDICE 1

A Término Inglés English Term	B Términos Españoles Propuestos Proposed Spanish Terms	C Término seleccionado Selected Term
Desiderata	Desiderata/Objetivos/Finalidad	Objetivos
View	Mirada/Visión/Perspectiva	Visión
Task Forces	Grupos de tareas/Grupos de trabajo	Grupos de trabajo
Circulated	Circularizado/Distribuido	Distribuido
Completion	Terminación/Finalización/Conclusión	Conclusión
Field trials	Campo experimental/Ensayos de campo/ Estudios de campo/Estudio piloto	Estudios de campo
Testing	Testeo/Estudio	Estudio

Appendix F.

Project A - First Year Timeline

	Feb	Mar	April	May	June	July	Aug	Sep	Oct	Nov	Dec	Jan	Feb
Step 1 Obtain measures to aid in the Development of instrument for Adolescent population Conduct computer search for papers and other instruments available													
Step 2 Research committee will review instruments and choose one as the most appropriate measure for our study (from step 1)													
Step 3 Prepare IRB and HIPPA Consent Forms													
Step 4 Submit IRB and HIPPA Consent Forms													
Step 5 Send chosen instrument to independent professional translator (from step 2)													
Step 6 Bilingual Committee Meetings to review instrument and develop items in Spanish based on appropriate constructs													
Step 7 Multi-National Bilingual Committee (MNBC) Meetings to review instrument and develop items in Spanish based on appropriate constructs													
Step 8 Bilingual committee will review the Spanish translation by the professional translator in step 5 followed by review from MNBC													
Step 9 New instrument will be assembled integrating both translated items and new items (from step 7 and 8)													
Step 10 Spanish version will be reviewed by all sites participating in study and suggested changes will be discussed.													

	Feb	Mar	April	May	June	July	Aug	Sep	Oct	Nov	Dec	Jan	Feb
Step 11 Develop materials and procedures for adolescent, primary caretaker and expert clinician focus groups.													
Step 12 Contact outpatient facilities for recruitment in all participating sites.													
Step 13 Obtain permits from corresponding institutions.													
Step 14 Recruit participants													
Step 15 Conduct 3 focus groups per site Adolescents 12 to 17 yrs (8) Parents of Adolescents (8) Expert Child Clinicians				X	X	X							
Step 16 Analyze focus groups data and produce report													
Step 17 Bilingual Committee meeting to modify instrument and develop new items based on focus group results													
Step 18 MNBC meeting to modify instrument and develop new items based on focus group results													