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Ishani Deo
Scripps College

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**CULTURAL FACTORS IN MENTAL HEALTH
REFERRAL AMONG ASIAN AMERICANS**

by

ISHANI R. DEO

**SUBMITTED TO SCRIPPS COLLEGE IN PARTIAL FULFILLMENT
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Ishani R. Deo

Scripps College

Abstract

Epidemiological studies have shown that disparities in mental health service utilization still exist among ethnic minority groups in the United States. This study looks specifically at the lay referral system and what factors influence the likelihood of an individual referring a friend to mental health services. Since college student populations have fewer barriers than most to seeking treatment, 60 Asian American and 49 White American college students were sampled for the purposes of this study. They evaluated one of four vignettes in which cultural competency of the potential therapist and type of symptoms being presented were manipulated. Though there was no significant interaction found, implications of the current findings and corrections to the methodology for future research are discussed.

Cultural Factors in Mental Health Referral Among Asian Americans

In the last decade, the Asian American population was the fastest growing minority group in the United States (Humes, Jones, & Ramirez, 2011). While the total US population is projected to grow by about 36% in the next 50 years, Asian Americans will increase their numbers by a staggering 127% (US Census Bureau, 2012). As they make up more of the population, it is increasingly important to be cognizant of cultural differences that distinguish this group from the general American population, particularly with regards to mental health.

One of the major contrasts between Asian and American cultures is where they fall on the scale of collectivism and individualism. Broadly speaking, Asian cultures are more collectivist than their European and American counterparts (Triandis, 2012). Collectivists define themselves in relationship to a group, and prioritize group norms, goals, and relationships (Triandis, 2012). Meanwhile individualistic cultures, like the United States, define the self as independent of any group and prioritize individual attitudes and needs (Triandis, 2012). Because their culture of origin is collectivist but their present environment is individualistic, many Asian Americans exist at the intersection of these two conflicting constructs. As a result of these dual influences, Asian Americans have been shown to be more collectivist than European Americans (Coon & Kemmelmeier, 2001). But this is only the most basic of dissimilarities. Psychological differences between Asian Americans and White Americans have been found in everything from problem-solving (Kim, 2002), to raising children (Jambunathan, Burts, & Pierce, 2000), to a preference for different shapes and objects (Kim & Markus, 1999). Over many decades of research it has become apparent that regardless of shared

American nationality, most Asian Americans are constantly being influenced in some way by their culture of origin, including effects on their mental health.

Prevalence of Mental Illness in the United States

Within the field of mental health, influences of race and culture can be demonstrated by how mental illness manifests among subgroups in the United States population. This information is easily found by looking at any one of the recent epidemiological studies conducted by the National Institute of Mental Health. One of the most well known of these studies was the National Comorbidity Survey Replication (NCS-R), a two-phase, nationally representative survey conducted from 2001 to 2003 with over 9000 adult participants (Kessler & Merikangas, 2004). In order to make accurate diagnoses, the NCS-R drew from the World Health Organization Composite International Diagnostic Interview (CIDI), which is compliant with both the *International Classification of Diseases, 10th Revision*, and the *DSM-IV* (Kessler et al., 2004). Among the 5692 individuals who completed both parts of the NCS-R, there was a 46.4% lifetime prevalence of one or more *DSM-IV* disorder (Kessler et al., 2005a). The 12-month prevalence among the same sample was a little more than half of that at 26.2% (Kessler, Chiu, Demler, & Walters, 2005b). These percentages, however, are for the general population, and do not address whether or not there is any variation by race and ethnicity.

A closer look at 12-month prevalence rates disaggregated by racial group reveals that Whites had a significantly higher prevalence rate than Blacks and a rate similar to Latinos (Ault-Brutus, 2012). Yet neither the NCS-R nor its predecessor, the NCS, present disaggregated data on Asian Americans, despite the fact that they are the third largest minority group in the United States. This was rectified through the National Latino and Asian American Study, a nationwide epidemiological study that used the CIDI instrument

from the NCS-R but targeted only members of those two minority groups (Takeuchi et al., 2007). Of the approximately 2000 Asian Americans who participated in the survey, the lifetime prevalence of having at least one *DSM-IV* disorder was 17.3%, while the 12-month prevalence was 9.19% (Takeuchi et al., 2007). Not only are these rates lower than those of the general population, they are also lower than the rates of the three racial groups surveyed by the NCS-R. Over a 12-month period, a mere 8.6% of Asian Americans used any sort of service for mental health issues compared to 17.9% of the general population (Abe-Kim et al., 2007; Wang, Lane, Olfson, Pincus, & Kessler, 2005). However, among those diagnosed with a *DSM-IV* disorder by the CIDI, only 34.1% of Asian Americans sought professional help, versus 41.1% of the general population (Abe-Kim et al., 2007; Wang et al., 2005). These findings seem to indicate conflicting messages: Asian Americans are reporting fewer symptoms of mental illness than the general population, but those who could benefit from treatment are less likely to seek it. So while Asian Americans might be psychologically healthier, their help-seeking behaviors are poorer than average. It is also possible that Asian Americans have the same incidence rate of disorders as the national average, but are failing to report. A common cultural trait like shame may be leading to less reporting as well as less help seeking than White Americans. Regardless of the reason, Asian American service usage is lower than the norm for a reason other than the actual incidence rate.

Treatment Barriers

Yet even the service usage reported by the general American population is lower than the prevalence rate of disorders, indicating the existence of barriers to treatment. A review of the NCS-R data looked at three major types of barriers: perceived need, attitudes, and structural barriers (Mojtabai et al., 2011). Underestimating the need for

services is one of the most prominent obstacles, though as might be expected, low perceived need was more common among those with milder disorders (Mojtabai et al., 2011). Among those individuals with more severe disorders, attitudes towards treatment were the most frequent barrier, though structural concerns such as distance and affordability also played some part (Mojtabai et al., 2011). The most frequent attitude preventing treatment was the desire to solve the problem independently, followed by the belief that the problem had gone away on its own (Mojtabai et al., 2011). Negative evaluations of service providers were also an inhibiting factor (Mojtabai et al., 2011). The existence of these barriers should not be surprising. After all, of the approximate quarter of the US population that has had a DSM-IV disorder in the last 12 months, more than half are not seeking treatment for their symptoms (Kessler et al., 2005b; Wang et al., 2005).

In some ways, Asian Americans face the same obstacles as the White American majority on the path to seeking help. Yet the influence of culture on these barriers cannot be discounted, serving as a possible explanation for why those with a disorder among this population have an even lower treatment-seeking rate than those in the general population. Studies have shown that even the conceptualization of mental illness varies between Asian Americans and White Americans, such that Asian Americans perceive the state of one's mental health as being a product of the social environment (Karasz, 2005; Lu, 2002). From this perspective, poor mental health is a normal response to conflict and not worthy of concern. Moreover, distress in peer and familial relationships is often expressed via somatic complaints in addition to psychological ones (Leong & Lau, 2001). The blurred lines between physical and psychological problems can lead to seeking medical rather than psychological advice (Leong & Lau, 2001). In other words, Asian

Americans have the inclination to conflate mental illness with physical and social difficulties, and avoid considering the problem in psychological terms. Both the theorized cause and the expression of mental illness may lead Asian Americans to believe there is little need for counseling services, preventing them from seeking this specific kind of treatment (Leong & Lau, 2001; Sue & Sue, 1990).

Those Asian Americans who recognize that they have a mental illness face another deterrent in the potential consequences to pursuing professional counseling. Self-control and conformity are typically emphasized in Asian cultures as important values, and so mental illness is seen as a failure to exercise appropriate control over one's negative thoughts (Sue & Morishima, 1982; Sheu & Sedlacek, 2004). Because mental illness is thought of as a matter of internal willpower, it follows that there is little perceived need for professional treatment. Rather, seeking treatment indicates the inability of the individual to appropriately manage his or her cognitions and affect. Thus, the fear of facing negative evaluations from the surrounding community may be one of the factors that cause Asian Americans to prefer to seek nonprofessional help, which is less obviously associated with mental illness (Chu, Hsieh, & Tokars, 2011). While anyone seeking treatment might want to avoid such evaluations, the Western individualistic attitude is more accepting of going against the prevailing group norms. Comparatively, the collectivist tendencies of Asian Americans put more value in positive relationships with one's group, and so negative responses are weighted more strongly by these individuals.

Indeed, the dominating attitudinal factor for Asian Americans considering mental health treatment is stigma. This results from the importance placed on saving face, and the corresponding concept of loss of face, in these communities (Sue & Morishima,

1982). As defined by Sue and Morishima (1982), loss of face is the threat or actual loss of social standing resulting from undesirable actions. While losing social standing is a cross-culturally acknowledged consequence, the collectivism prevalent in Asian cultures makes this a more significant threat to Asian Americans than White Americans. Since the self is defined with regards to one's group, receiving positive feedback from the group is crucial to maintaining self-esteem. Among Asian Americans, perceived stigmatization by others has indeed been shown to predict greater self-stigma (Cheng, Kwan, & Sevig, 2013). Furthermore, the status of the individual reflects back on their social groups, meaning that loss of face is also a threat to those who associate with the individual in question (Leong, Kim, & Gupta, 2011). Receiving counseling is considered to be a stigmatized action that will lead to loss of face (Shon & Ja, 1982). As a result, treatment might not only damage an individual's self-perceptions, but also hurt relationships with friends and family who could otherwise be important sources of support. It is not surprising, then, that research has found that loss of face correlates with lower openness to seeking treatment (Leong et al., 2011). Loya, Reddy, and Hinshaw (2010) further found that in a college student sample, higher levels of personal stigma partially mediated the more negative attitudes held by Asian American students when compared to White American students. Naturally, if the culturally-based view of psychological counseling is that it is likely to lead to social shaming, that serves as a significant barrier to seeking help. This is an even stronger barrier when we recall that conflict with members of one's social group is, in and of itself, a factor of psychological distress. If help-seeking behavior only increases the distressing symptoms via stigma association, Asian Americans are not going to choose to seek help.

The last of the three main deterrents, structural obstacles, differs not only between Asian Americans and the general population, but also within the Asian American population. According to a census survey carried out between 2007 and 2009, 32% of Asian Americans are limited-English proficient (LEP), which is to say they speak English less than 'very well'. More than half of Vietnamese Americans are LEP, and even the most fluent Asian American ethnic group has a LEP rate of 18%, while the total US population is only at 9%. (Asian Pacific American Legal Center, 2011). Bauer, Chen, and Alegría (2010) found that LEP status was significantly related to less use of services for mental disorders. Without a common language, LEP Asian Americans are not even able to seek a therapist, much less build a therapeutic relationship, decreasing their service use. The most basic of structural barriers, cost, also affects Asian Americans in a particularly subtle way. While the Asian American poverty rate is lower than the national average, and their median income higher, there is a significant range within Asian ethnic groups (Pew Research Center, 2011). As an example, of the six largest ethnic groups, three average below the national poverty rate (Pew Research Center, 2011). Lumping all Asians together by racial group instead of ethnicity actually hurts those who cannot afford to seek treatment. Because Asian Americans in general are well educated and well paid, little attention is given to the Asian ethnic groups that are facing serious socioeconomic disadvantages. As a consequence of this, Asian Americans as a whole receive less governmental and organizational consideration when it comes to helping racial minority groups access and pay for health care. This is despite the need demonstrated by a significant percentage of their number (Pew Research Center, 2011). So while structural barriers might seem relatively universal, they should nevertheless be considered through the lens of cultural differences.

Factors in Help-Seeking

However, despite dealing with impediments beyond what the average individual must face, some Asian Americans do seek help for mental illness. One of the major mechanisms through which they do so is known as the lay referral network. The lay referral network is a concept developed by Eliot Friedson (1960), in which individuals who suspect illness consult their social groups before seeking out professional help. This method of help-seeking is significant for several reasons. First, the mere presence of a lay referral network in and of itself has a positive impact. An early review of studies on lay referral documented a trend in which individuals who had a supportive social group also had enhanced coping resources and mental health competence (Gottlieb, 1976). Though it is not the same as professional treatment, the existence of the lay referral network is beneficial to those with mental disorders. Second, lay referral is an important method of getting people, and Asian Americans in particular, to counseling. In fact, more Asian Americans than Whites join treatment services via lay referral (Akutsu, Snowden, & Organista, 1996). Asian Americans have also shown a preference for soliciting advice from friends and family over going directly to health professionals (Chu et al., 2011; Maki & Kitano, 2002). Consulting the lay network is more casual and less easily associated with mental illness, and so it likely doesn't have the same stigma attached to it as professional treatment does. Lastly, the full potential of lay referral has yet to be taken advantage of. Uomoto and Gorsuch (1984) found that in one community, Asian Americans were significantly more likely to suggest a troubled friend deal with the problem on their own than they were to refer them to professional counseling. So while there is an avoidance of treatment-seeking behavior among the individuals with disorders, there is also a failure on the part of their lay networks to direct them to the appropriate

professionals. Thus, while the lay referral network is a frequently used resource for Asian Americans struggling with mental illness, it is not a particularly efficient one when it comes to helping them get to treatment. Research also tends to focus on professional help-seeking, rather than the lay network.

Therefore, in order to get an idea of which factors increase use of the lay network, we must consider what factors increase general treatment seeking. One such factor is the type of symptoms being presented. Physical symptoms have been linked to increased help-seeking behaviors, but psychological symptoms are significantly more stigmatized and do not have the same correlation with help-seeking, despite the difficulty of living with said symptoms (Bauer, Chen, & Alegria, 2012; Hsu et al., 2008; Kung & Lu, 2008). Interestingly, Cheng, Kwan, and Sevig (2013) found that higher levels of psychological distress, specifically feelings of depression and anxiety, were associated with individuals expecting greater stigmatization by their social groups should they choose to seek counseling. This mechanism may explain why somatic symptoms associated with psychopathology are more likely to prompt help-seeking behavior than purely psychological symptoms. Now, there are some who argue that Asian Americans simply present more somatic symptoms, and this is why somaticization is so prevalent in Asian American samples (Kleinman, 1977). Yet in more recent years, other researchers have countered this by comparing community and clinical samples, finding that somatic symptom reporting is higher only among those who are seeking mental health treatment (Weiss, Tram, Weisz, Rescorla, & Achenbach, 2009). Indeed, symptom type may take priority over symptom severity, as referrals to counseling services have been shown to remain static across disorder severity (Uomoto & Gorsuch, 1984). These findings indicate that somatic symptoms are not more prevalent than psychological symptoms,

merely that this population is more comfortable reporting them. It is therefore likely that they are also more willing to consult the lay network regarding physical symptoms.

Another trend in the Asian American population is the preference for culturally competent therapy programs. As applied to mental health providers, cultural competency is typically defined as the ability to effectively counsel clients in ways appropriate to their cultural background (Sue, Zane, Hall, & Berger, 2009). Though there are many different conceptualizations of cultural competency, they mostly fall into three categories: the traits of the individual counselor, the skills and interventions being used, and the process of shifting between cultural perspectives (Sue et al., 2009). The first includes the counselor's knowledge of the both the client's culture and his or her own culturally based attitudes and beliefs, and how these might influence the therapeutic process (Sue et al., 2009). The second perspective, of skills and interventions, involves therapists learning through training and experience how to adapt therapy for different clients (Sue et al., 2009). Finally, the third category looks at competency as the therapist's ability to take both her own cultural perspective and the client's perspective, and be flexible in moving between the two (Sue et al., 2009). What the literature tends to agree upon, however, is the benefit of culturally competent therapy. Not only are referrals more likely to be made to a program specifically oriented to an ethnic group compared to a mainstream service, but the people being referred are also more likely to be act upon such referrals (Akutsu et al., 1996). Their preference continues when they are participating in these programs. Clients are more likely to stay in treatment when receiving culturally appropriate therapy, while the absence of these services is a potential cause of discontinuation (Takeuchi, Sue, & Yeh, 1995; Zane & Yeh, 2002). It has also been shown that culturally competent programs are preferred for good reason. Griner and Smith (2006) compared 76 studies

evaluating culturally adapted interventions, and found that not only were these beneficial, but the ethnic-specific interventions were four times more effective than those meant for a general clientele. Furthermore, they found that interventions carried out in a non-English native language were twice as effective. Culturally adapted therapy is clearly a positive contributing factor to Asian Americans' help-seeking behaviors.

Acculturation in Asian Americans

However, by conflating ethnic identity and culture, we make the incorrect assumption that Asian Americans will only hold the perspective of their culture of origin, when in fact there is the possibility of acculturation. In this instance, acculturation can be defined as the process of change that occurs when an individual becomes a cultural minority, and the extent to which aspects of the 'host' culture are adopted and those of the original culture are replaced (Suinn, 2009). This can happen after immigration, but it also occurs in individuals who are born into a culture but have heritage ties to a different one (Suinn, 2009). Acculturation is not a sudden change, nor does it have a universal endpoint. This means that, for example, someone might be almost entirely acculturated to the host culture of the US, while another retains most of their traditional culture, and yet both would be considered Asian American. If mental health, help-seeking, and referral behavior are strongly mediated by culture as a variable, then acculturation should serve as a measure of how strongly a given culture will affect an individual's presentation on all of these variables.

However, acculturation is not always easy, and can have both positive and negative effects. As they adjust the balance between their host and original cultures, individuals may suffer from acculturative stress, or anxiety resulting from struggling with this complex process (Berry, Kim, Minde, & Mok, 1987). Research has shown that

acculturative stress conceptually links acculturation with poor psychological wellbeing, regardless of whether individuals have low or high acculturation (Baker, Soto, Perez, & Lee, 2012). Low acculturation to the host culture is also associated with more problems with daily functioning (Gim, Atkinson, & Kim, 1991), and increased likelihood of both depression (Gupta, Leong, Valentine, & Canada, 2013; Hwang, Chun, Takeuchi, Myers, & Siddarth, 2005) and suicide risk (Lau, Jernewall, Zane, & Myers, 2002). More positively, higher levels of acculturation to Western values are associated with lower levels of stigma and more openness to counseling among Asian Americans (Atkinson & Gim, 1989). Because stigma is rooted in Asian cultural values, replacing those values with more accepting American ones would logically lead to less stigma and more help-seeking behavior. Even in therapy, acculturation to the point of matching with one's counselor is positively related to the working alliance between client and counselor (Kim, Ng, & Ahn, 2005). Thus, those who have more fully acculturated may be more comfortable with mainstream therapy programs, while those clients who are less acculturated may be more comfortable with someone who matches their cultural minority viewpoint. Acculturation as a factor is not always positive or negative, but it inevitably interacts with other variables in ways that make it very relevant to cross-cultural research.

Mental Health in Asian American College Students

Adapting therapy and interventions to different levels of Asian American acculturation is a particularly important goal on college campuses. This is because the late adolescent/young adult subset of Asian Americans has a 12-month prevalence rate of at least one *DSM-IV* disorder that, at 33.1%, is more than triple that of the general Asian American population (Blanco et al., 2008). Though it is possible that this subset simply has a higher rate of reporting than other Asian Americans, their prevalence rate is also

higher than that of the general population (Kessler et al., 2005b). It is, then, relatively unlikely that the difference is merely due to willingness to report. Asian American college students are also more likely to have had suicidal thoughts and attempts than White Americans of the same age (Kisch, Leino, & Silverman, 2005). This population is one at especially high risk for mental health problems, and yet prior research has also indicated that they are underutilizing available services. Fewer Asian Americans than White Americans are seeking counseling, and they are more likely to terminate prematurely (Brinson & Kottler, 1995).

However, college students actually have fewer obvious barriers to treatment than the rest of the population. Structural concerns, such as being able to afford therapy, have long been thought to prevent utilization, even when treatment is desired (Sorkin, Nguyen, & Ngo-Metzger, 2011). Low-income families, or those who do not have the time or ability to travel to the service site, are therefore unable to seek help. On a college campus, however, such structural barriers are not present. Counseling services tend to be offered to students either free of charge or at a discounted rate, and are easily accessible because they are located on the campus itself. Any difference in utilization must then be due to characteristics of the counseling or the client's beliefs and attitudes, because factors such as socioeconomic status and location are no longer obscuring usage rates. For this reason, the current study uses a sample of students recruited from various colleges and universities across the nation in order to represent Asian Americans of this age group. While the help-seeking process is relatively well understood at this point, there is a dearth of research on how cultural differences affect lay referral to professional services.

Purpose of Study and Hypotheses

The purpose of this study is to determine whether perceptions of a counselor's cultural competence and the type of symptoms being presented by the target of the referral influence the likelihood of referring another person to mental health services. The methodology used measures responses to vignettes about a referral scenario, in the style of Uomoto and Gorsuch's 1984 study on Japanese American college students. This study expands the sample to students of both Asian American and White racial identity, and focuses on cultural competence and somatic versus psychological symptoms. The first hypothesis is that Asian Americans will be less likely to make referrals to professional services than White Americans. Second, when there is a mix of somatic and psychological symptoms, there will be an increase in referral likelihood compared to when only psychological symptoms are presented. There is also a predicted increase in referral likelihood when the counselor is perceived as culturally competent. In addition, several interactions are predicted. The presence of physical symptoms will increase the likelihood of referral for Asian American students but not for White Americans. Perceived cultural competence of the counselor is also hypothesized to increase the likelihood of referral for Asian American students but not for White Americans. Lastly, it is hypothesized that there will be an interaction such that Asian Americans, but not White Americans, will be more likely to recommend someone with psychological symptoms than a combination of somatic and psychological symptoms if the counselor is perceived as being culturally competent.

Method

Participants

Participants were 60 Asian American and 49 Caucasian students recruited from college campuses in the United States. Recruitment took place via email messages to

Asian American affiliation groups, snowball sampling on Facebook, and paper flyers posted around some of the campuses. Participants were offered the opportunity to participate in a raffle for \$25 and \$50 gift cards as compensation. All of the participants were between the ages of 18 and 25, with an average age of 20.0. The gender distribution was skewed strongly towards female participants, who made up 94.5% of the total responses, while male participants made up 4.6% and non-binary individuals made up 0.9%.

Materials

The first part of the survey was comprised of one of four vignettes describing a referral scenario (see Appendix A). Each vignette involved a friend seeking advice on certain symptoms, and a mental health professional to whom this friend could be referred. The hypothetical friend was described as matching the participant on race, gender, and age. One example is shown below.

For this scenario, please imagine a friend similar to yourself in age, gender, and race is coming to you for advice. Lately, he or she has been experiencing increasingly high levels of anxiety. This friend has also been troubled by feelings of worthlessness. He or she has been especially tired recently, and has been having periodic stomach pain. This has been continuing for several weeks now.

Dr. Lee is a therapist who works at the on-campus counseling center who has recently moved to your school after a 10-year stint at the Asian Pacific Counseling and Treatment Center in Los Angeles. The APCTC is a county outpatient clinic that offers evaluation, individual and family counseling, and support groups to a primarily middle-class Asian American population. Clients range across all ages and genders. Therapy at the clinic involves modern cognitive-behavioral interventions that have been developed for Asian heritage cultures. Dr. Lee comes highly recommended by both colleagues and clients from this clinic.

Scenarios contained a unique pairing of the two manipulated variables. The first of these was the type of symptom presented by the subject of the referral (psychological or a combination of physical and psychological), and the second was the cultural competence of the counselor to whom the referral could be made (competent or not

competent). Physical symptoms were drawn from previous studies linking them to psychopathology in ethnic minority populations (Escobar et al., 2010; Escobar et al., 1987), while psychological symptoms were chosen from the DSM-IV criteria for depression and generalized anxiety disorder (American Psychiatric Association, 2000). This variable was manipulated in the vignette by changing the symptoms listed from purely psychological to a mix of psychological and physical. Cultural competence, defined as previous work experience counseling minority populations, was based on some of the criteria set down by Sue, Zane, Hall, and Berger (2009). In the vignette, this was manipulated by changing the name and primary population of the institution at which the therapist had worked.

A brief series of questions followed the presentation of the vignette, all of which used a 5-point Likert scale (see Appendix B). This questionnaire began with the likelihood that the participants would make the referral described. Respondents then rated the likelihood that the symptoms were caused by physical illness and the likelihood that the cause was mental illness as a manipulation check. Participants were then asked to evaluate the degree of cultural sensitivity that they perceived the therapist possessed, and finally, how familiar they themselves felt they were about mental illness and its treatment in general.

In the second part of the survey, participants filled out the Suinn-Lew Asian Self-Identity Acculturation Scale (Suinn, Rickard-Figueroa, Lew, & Vigil, 1987), modified by the investigator to remove 'Oriental' as that terminology is now seen as potentially offensive. An examination of the original scale's internal consistency found an alpha coefficient of .88, and a review of its use in published studies concluded that it has validity as an assessment of acculturation (Ponterotto, Baluch, & Carielli, 1998; Suinn,

Rickard-Figueroa, Lew, & Vigil, 1987). The measure consists of 26 items, primarily multiple-choice questions, and acculturation was determined by following the scoring guidelines detailed by the scale's authors. Demographic information made up the last part of this section.

Procedure

The survey was advertised to college students across several campuses as being a study on health care referral. Interested individuals were directed to the link for a 15-minute online survey. After reading an informed consent form, indicating that they were over 18 years of age, and consenting to take the study, participants were randomly assigned to one of the four vignettes. Across all conditions, participants were instructed to read the vignette and then answer several questions about the scenario it described. After completing the questionnaire, participants were debriefed and invited to enter the raffle for compensation.

Results

The manipulations of cultural competency and symptom type were tested using a series of one-way ANOVAs. As anticipated, therapists with a history of working with Asian American clients ($M = 4.233$, $SD = .871$) were rated significantly more culturally competent than their peers who did not have that background ($M = 3.388$, $SD = .953$), $F(1,107) = 23.352$, $MSe = .826$, $p < .001$. However, despite the intention of the vignette design, symptom type did not significantly influence the extent to which participants judged an illness to have a physical cause, $F(1,105) = 2.249$, $MSe = .865$, $p = .137$, or a psychological one, $F(1,107) = 1.966$, $MSe = .714$, $p = .164$.

For testing the primary hypothesis, a 2x2x2 ANOVA was used to look at the interaction between race, cultural competency, and symptom type. Contrary to the

hypothesis, this interaction was not found to have a significant effect on likelihood of referral to mental health services, $F(1,101) = 2.395$, $MSe = .755$, $p = .125$. Also contrary to what was predicted, there were no significant two-way interactions for race and symptom type, $F(1,101) = .525$, $MSe = .755$, $p = .470$, or race and competency, $F(1,101) = 3.00$, $MSe = .755$, $p = .086$, on likelihood of referral. Of the hypothesized main effects, neither race, $F(1,101) = .322$, $MSe = .755$, $p = .572$, competency, $F(1,101) = .511$, $MSe = .755$, $p = .476$, nor symptom type, $F(1,101) = 655$, $MSe = .755$, $p = .420$, had significant effects on this dependent variable.

It was suspected that given the non-significance of these results, covariates might be obscuring the relationship between the three independent variables of race, competency, and symptoms and the dependent variable of likelihood of referral. A Pearson's correlation was conducted to determine if acculturation, familiarity with mental health issues, perceptions of the symptoms as being caused by physical illness, and perceptions of the symptoms as being caused by mental illness might be valid covariates. Perceptions that the cause was physical illness and perceptions that the cause was mental illness were both significantly correlated with likelihood of referral (Table 1).

Table 1. Correlation of potential covariates to likelihood of referral

	Likelihood of referral $r(N)$
Acculturation	.144(96)
Familiarity	.130(109)
Cause physical	.279(107)**
Cause mental	.251(109)**

** . Correlation is significant at the .01 level

A 2x2x2 ANCOVA was run using perceptions that the cause was physical illness as a covariate, and was found to be non-significant, $F(1,98) = 2.882$, $MSe = .711$, p

= .093. While believing the cause was physical was a significant covariate, $F(1,98) = 8.956$, $MSe = .711$, $p = .003$, it was not able to account for enough variance to make the relationship between the IVs and the DV significant. Next, the same test was run using perceptions that the cause was mental illness as a covariate instead, but also did not reach significance, $F(1,98) = 1.671$, $MSe = .711$, $p = .199$. In fact, despite also significantly contributing to the variance, $F(1,98) = 4.678$, $MSe = .711$, $p = .033$, using this variable as a covariate increased the p-value from the original ANOVA.

Further exploratory analyses found that symptom type did not significantly affect perceptions that the cause was either mental, $F(1,107) = 1.966$, $MSe = .714$, $p = .164$, or physical illness, $F(1,107) = 2.249$, $MSe = .865$, $p = .137$. However, when the perceptions of cause variables were recoded to be dichotomous (physical/not and mental/not), both were significantly affected by race. Perceptions that the symptoms were caused by a physical illness were significantly more likely among Asian American participants ($M = 1.259$, $SD = .442$) than White participants ($M = 1.102$, $SD = .306$), $F(1,105) = 4.380$, $MSe = .149$, $p = .039$. Similarly, perceptions that the symptoms were caused by a mental illness were significantly more likely among White participants, ($M = 1.918$, $SD = .277$) than Asian American ones ($M = 1.717$, $SD = .454$), $F(1,107) = 7.405$, $MSe = .148$, $p = .008$.

Discussion

The purpose of this study was to examine if the specific factors of race, symptom type, and cultural competence played a role in increasing referrals to mental health services through the lay referral system. In contrast to the hypotheses set forth at the beginning of the research project, these three factors did not significantly interact with each other to influence an individual's likelihood of referring their friend to mental health

treatment, nor did they individually have any significant main effect on this outcome. This has several potential explanations. The first, and most straightforward, is that there is simply no relationship between these factors and the likelihood of referring someone else to counseling among the population sampled. However, this would be contradictory to existing literature, and is probably too simplistic as well.

A more feasible explanation is that there was a flaw in the methodology that led to non-significant findings. It should be noted at this time that the sample was primarily comprised of liberal arts students, many of whom have taken at least one psychology class for a general education requirement. Although familiarity with mental health issues did not correlate with likelihood of referral, it is still possible that a shared background in psychology has had some erasing effect on stigma against mental health issues. If this is true, it could have increased the likelihood that Asian American participants would make a referral, bringing their ratings closer to those of their White counterparts.

Furthermore, the number and demographics of the participants is certainly a limitation of the study. The small number of participants from a select number of schools, all of which were located on the West Coast, means that the findings are somewhat restricted in how well they can be generalized. Involving more participants from a broader range of universities and colleges might have provided a greater variety in cultural values and in perspectives between the comparison groups. There was also a disparity in the number of male and female participants. A study by Fogel and Ford (2005) found that while Asian American females still perceive more stigma than White females, they have lower perceptions of their friends' stigma towards mental illness than Asian American males do. There is also some evidence that female Asian Americans are more willing to seek informal help than males (Young, 1998). Traditional masculine

gender roles in both cultures promote the appearance of strength and shun signs of weakness (Chang & Subramaniam, 2008). However, for Asian Americans in particular, seeking psychological help is contradictory to the masculine ideal (Chang & Subramaniam, 2008). Had more Asian American males been included in these analyses, they might have brought down the average likelihood of Asian Americans making referrals because of their stronger negative attitudes towards help-seeking.

Another possible problem with the methodology is that the symptoms described for both physical and mixed conditions were indicative of comparatively common mental illnesses – that is, anxiety and depression. Due to their relative prevalence, it is plausible that stigma about treatment of these illnesses is less than the stigma that exists for more severe and more noticeable disorders such as schizophrenia. An individual with schizophrenia might better fit the stereotype of mental illness that prompts stigmatizing behavior from others, especially when compared to symptoms that can occur in healthy individuals on a short-term basis. Certainly anxiety and feelings of worthlessness are not unique to people with a diagnosis of major depression or generalized anxiety disorder.

That is not to say that there were not important findings from this study. As evidenced by the manipulation checks, while competency was easily operationalized and understood by participants, symptom type was not actually related to what individuals perceived the cause of those symptoms to be. Though one might assume that symptoms would naturally be used as a guide to determine the illness causing them, exploratory analyses supported the idea that such judgments were made more on the basis of racial identity than the nature of the disorder in question. Existing literature has shown that Asian Americans are more comfortable admitting to physical symptoms and seeking help for physical disorders (Bauer, Chen, & Alegria, 2012). The current analyses actually go

one step further by indicating that Asian American individuals apply this behavior to others as well as themselves, judging another person's symptoms as being due to a physical disorder. This is perhaps testament to how deeply ingrained the cultural taboo against mental illness runs in Asian American communities, and it suggests new avenues for future research on this topic.

Thus in the future, in addition to broadening the sample population and expanding the symptom checklist to include more stigmatized behavior, it would behoove any interested psychologists to consider pursuing the findings hinted at by the analyses not hypothesized in this study. Specifically, for milder symptoms, failure at the stage of recognition may be at least part of the reason why Asian Americans are not seeking help at a rate appropriate to the prevalence of mental illness. Though factors related to the disorder and the therapist should not be forgotten, if this is indeed the case, then perhaps even education alone could increase rates of help-seeking and referral in these communities.

Ultimately, the fact that this particular study was not able to find support for its hypotheses is not relevant to the larger concern at hand. The problem of Asian Americans and their insufficient rates of treatment seeking behavior is, after all, multi-faceted. Cultural psychologists must continue to broaden their understanding of its causes in an attempt to discover possible solutions. The more angles from which this issue can be studied, the more quickly it can eventually be dismantled to the benefit of the entire population.

References

- Abe-Kim, J., Takeuchi, D. T., Hong, S., Zane, N., Sue, S., Spencer, M. S., & ... Alegría, M. (2007). Use of mental health-related services among immigrant and US-born Asian Americans: Results from the National Latino and Asian American Study. *American Journal of Public Health, 97*, 91-98. doi:10.2105/AJPH.2006.098541
- American Psychiatric Association. (2000). *Diagnostic and statistical manual of mental disorders* (4th ed., text rev.). Washington, DC: Author.
- Akutsu, P. D., Castillo, E. D., & Snowden, L. R. (2007). Differential referral patterns to ethnic-specific and mainstream mental health programs for four Asian American groups. *American Journal of Orthopsychiatry, 77*, 95-103. doi:10.1037/0002-9432.77.1.95
- Akutsu, P. D., Snowden, L. R., & Organista, K. C. (1996). Referral patterns in ethnic-specific and mainstream programs for ethnic minorities and Whites. *Journal of Counseling Psychology, 43*, 56-64. doi:10.1037/0022-0167.43.1.56
- Asian Pacific American Legal Center. (2011). *A community of contrasts*. Retrieved from http://www.advancingjustice.org/pdf/Community_of_Contrast.pdf
- Atkinson, D. R., & Gim, R. H. (1989). Asian-American cultural identity and attitudes toward mental health services. *Journal of Counseling Psychology, 36*, 209-212. doi:10.1037/0022-0167.36.2.209
- Ault-Brutus, A. (2012). Changes in racial-ethnic disparities in use and adequacy of mental health care in the United States, 1990–2003. *Psychiatric Services, 63*, 531-540. doi:10.1176/appi.ps.201000397

- Baker, A. M., Soto, J. A., Perez, C. R., & Lee, E. A. (2012). Acculturative status and psychological well-being in an Asian American sample. *Asian American Journal of Psychology, 3*, 275-285. doi:10.1037/a0026842
- Bauer, A. M., Chen, C., & Alegría, M. (2010). English language proficiency and mental health service use among Latino and Asian Americans with mental disorders. *Medical Care, 48*, 1097-1104. doi:10.1097/MLR.0b013e3181f80749
- Bauer, A. M., Chen, C., & Alegría, M. (2012). Associations of physical symptoms with perceived need for and use of mental health services among Latino and Asian Americans. *Social Science & Medicine, 75*, 1128-1133. doi:10.1016/j.socscimed.2012.05.004
- Berry, J. W., Kim, U., Minde, T., & Mok, D. (1987). Comparative studies of acculturative stress. *International Migration Review, 21*, 491-511. doi:10.2307/2546607
- Blanco, C., Okuda, M., Wright, C., Hasin, D. S., Grant, B. F., Liu, S., & Olfson, M. (2008). Mental health of college students and their non-college-attending peers: Results from the National Epidemiologic Study on Alcohol and Related Conditions. *Archives of General Psychiatry, 65*, 1429-1437. doi:10.1001/archpsyc.65.12.1429
- Brinson, J. A., & Kottler, J. A. (1995). Minorities' underutilization of counseling centers' mental health services: A case for outreach and consultation. *Journal of Mental Health Counseling, 17*, 371-385.
- Chang, T., & Subramaniam, P. (2008). Asian and Pacific Islander American men's help-seeking: Cultural values and beliefs, gender roles, and racial stereotypes. *International Journal Of Men's Health, 7*(2), 121-136. doi:10.3149/jmh.0702.121

- Cheng, H., Kwan, K., & Sevig, T. (2013). Racial and ethnic minority college students' stigma associated with seeking psychological help: Examining psychocultural correlates. *Journal of Counseling Psychology, 60*, 98-111. doi:10.1037/a0031169
- Chu, J. P., Hsieh, K., & Tokars, D. (2011). Help-seeking tendencies in Asian Americans with suicidal ideation and attempts. *Asian American Journal of Psychology, 2*, 25-38. doi:10.1037/a0023326
- Coon, H. M., & Kimmelmeier, M. (2001). Cultural orientations in the United States: (Re)examining differences among ethnic groups. *Journal of Cross-Cultural Psychology, 32*, 348-364. doi:10.1177/0022022101032003006
- Escobar, J. I., Cook, B., Chen, C., Gara, M. A., Alegría, M., Interian, A., & Diaz, E. (2010). Whether medically unexplained or not, three or more concurrent somatic symptoms predict psychopathology and service use in community populations. *Journal of Psychosomatic Research, 69*, 1-8. doi:10.1016/j.jpsychores.2010.01.001
- Escobar, J. I., Golding, J. M., Hough, R. L., Karno, M., Burnam, M. A., & Wells, K. B. (1987). Somatization in the community: relationship to disability and use of services. *American Journal of Public Health, 77*, 837-840. doi:10.2105/AJPH.77.7.837
- Fogel, J., & Ford, D. E. (2005). Stigma beliefs of Asian Americans with depression in an internet sample. *The Canadian Journal of Psychiatry / La Revue Canadienne de Psychiatrie, 50*(8), 470-478.
- Freidson, E. (1960). Client control and medical practice. *American Journal of Sociology, 65*, 374-82.

- Gim, R. H., Atkinson, D. R., & Kim, S. J. (1991). Asian-American acculturation, counselor ethnicity and cultural sensitivity, and ratings of counselors. *Journal of Counseling Psychology, 38*, 57-62. doi:10.1037/0022-0167.38.1.57
- Gottlieb, B. H. (1976). Lay influences on the utilization and provision of health services: A review. *Canadian Psychological Review/Psychologie Canadienne, 17*, 126-136. doi:10.1037/h0081829
- Griner, D., & Smith, T. B. (2006). Culturally adapted mental health intervention: A meta-analytic review. *Psychotherapy: Theory, Research, Practice, Training, 43*, 531-548. doi:10.1037/0033-3204.43.4.531
- Gupta, A., Leong, F., Valentine, J. C., & Canada, D. D. (2013). A meta-analytic study: The relationship between acculturation and depression among Asian Americans. *American Journal of Orthopsychiatry, 83*, 372-385. doi:10.1111/ajop.12018
- Hsu, L., Wan, Y., Chang, H., Summergrad, P., Tsang, B. P., & Chen, H. (2008). Stigma of depression is more severe in Chinese Americans than Caucasian Americans. *Psychiatry: Interpersonal and Biological Processes, 71*, 210-218. doi:10.1521/psyc.2008.71.3.210
- Humes, K. R., Jones, N. A., & Ramirez, R. R. (2011). *Overview of race and Hispanic origin: 2010*. Retrieved from <http://www.census.gov/prod/cen2010/briefs/c2010br-02.pdf>
- Hwang, W., Chun, C., Takeuchi, D. T., Myers, H. F., & Siddarth, P. (2005). Age of First Onset Major Depression in Chinese Americans. *Cultural Diversity and Ethnic Minority Psychology, 11*, 16-27. doi:10.1037/1099-9809.11.1.16

- Jambunathan, S., Burts, D. C., & Pierce, S. (2000). Comparisons of parenting attitudes among five ethnic groups in the United States. *Journal of Comparative Family Studies*, *31*, 395-406.
- Karasz, A. (2005). Cultural differences in conceptual models of depression. *Social Science & Medicine*, *60*, 1625-1635. doi:10.1016/j.socscimed.2004.08.011
- Kessler, R. C., Berglund, P., Chiu, W., Demler, O., Heeringa, S., Hiripi, E., & ... Zheng, H. (2004). The US National Comorbidity Survey Replication (NCS-R): Design and field procedures. *International Journal of Methods in Psychiatric Research*, *13*(2), 69-92. doi:10.1002/mpr.167
- Kessler, R. C., Berglund, P., Demler, O., Jin, R., Merikangas, K. R., & Walters, E. E. (2005a). Lifetime prevalence and age-of-onset distributions of DSM-IV disorders in the National Comorbidity Survey Replication. *Archives of General Psychiatry*, *62*, 593-602. doi:10.1001/archpsyc.62.6.593
- Kessler, R. C., Chiu, W., Demler, O., & Walters, E. E. (2005b). Prevalence, severity, and comorbidity of 12-month DSM-IV disorders in the National Comorbidity Survey Replication. *Archives of General Psychiatry*, *62*, 617-627. doi:10.1001/archpsyc.62.6.617
- Kessler, R. C. & Merikangas, K. R. (2004). The National Comorbidity Survey Replication (NCS-R): Background and aims. *International Journal of Methods in Psychiatric Research*, *13*(2), 60-68. doi:10.1002/mpr.166
- Kim, H. S. (2002). We talk, therefore we think? A cultural analysis of the effect of talking on thinking. *Journal of Personality and Social Psychology*, *83*, 828-842.

- Kim, H., & Markus, H. (1999). Deviance or uniqueness, harmony or conformity? A cultural analysis. *Journal of Personality and Social Psychology*, 77, 785-800. doi:10.1037/0022-3514.77.4.785
- Kim, B. K., Ng, G. F., & Ahn, A. J. (2005). Effects of client expectation for counseling success, client-counselor worldview match, and client adherence to Asian and European American cultural values on counseling process with Asian Americans. *Journal of Counseling Psychology*, 52, 67-76. doi:10.1037/0022-0167.52.1.67
- Kisch, J., Leino, E. V., & Silverman, M. M. (2005). Aspects of suicidal behavior, depression and treatment in college students: Results from the spring 2000 National College Health Assessment Survey. *Suicide and Life-Threatening Behavior*, 35, 3-13.
- Kleinman, A. (1977). Depression, somatization, and the "new cross-cultural psychiatry." *Social Sciences and Medicine*, 11, 3-10.
- Kung, W. W., & Lu, P. (2008). How symptom manifestations affect help seeking for mental health problems among Chinese Americans. *Journal of Nervous and Mental Disease*, 196, 46-54. doi:10.1097/NMD.0b013e31815fa4f9
- Lau, A. S., Jernewall, N. M., Zane, N., & Myers, H. F. (2002). Correlates of suicidal behaviors among Asian American outpatient youths. *Cultural Diversity and Ethnic Minority Psychology*, 8, 199-213. doi:10.1037/1099-9809.8.3.199
- Leong, F. L., Kim, H. W., & Gupta, A. (2011). Attitudes toward professional counseling among Asian-American college students: Acculturation, conceptions of mental illness, and loss of face. *Asian American Journal of Psychology*, 2, 140-153. doi:10.1037/a0024172

Leong, F. L., & Lau, A. L. (2001). Barriers to providing effective mental health services to Asian Americans. *Mental Health Services Research, 3*, 201-214.

doi:10.1023/A:1013177014788

Loya, F., Reddy, R., & Hinshaw, S. P. (2010). Mental illness stigma as a mediator of differences in Caucasian and South Asian college students' attitudes toward psychological counseling. *Journal of Counseling Psychology, 57*, 484-490.

doi:10.1037/a0021113

Lu, L. (2002). A preliminary study on the concept of health among the Chinese.

Counselling Psychology Quarterly, 15, 179-189.

doi:10.1080/09515070110104051

Maki, M. T., & Kitano, H. H. L. (2002). Counseling Asian Americans. In P. B. Pedersen, J. G. Draguns, W. J. Lonner, & J. E. Trimble (Eds.), *Counseling Across Cultures* (5th ed., pp. 109–131). Thousand Oaks, CA: Sage.

Mojtabai, R. R., Olfson, M. M., Sampson, N. A., Jin, R. R., Druss, B. B., Wang, P. S., & ... Kessler, R. C. (2011). Barriers to mental health treatment: Results from the National Comorbidity Survey Replication. *Psychological Medicine, 41*, 1751-

1761. doi:10.1017/S0033291710002291

Pew Research Center. (2013, April). *The rise of Asian Americans*. Retrieved from

<http://www.pewsocialtrends.org/2012/06/19/the-rise-of-asian-americans/>

Ponterotto, J. G., Baluch, S., & Carielli, D. (1998). The Suinn-Lew Asian Self-Identity Acculturation Scale (SL-ASIA): Critique and research recommendations.

Measurement and Evaluation in Counseling and Development, 31(2), 109-124.

- Sheu, H. B., & Sedlacek, W. E. (2004). An exploratory study of help-seeking attitudes and coping strategies among college students by race and gender. *Measurements and Evaluation in Counseling and Development, 37*, 130–143.
- Shon, S. P., & Ja, D. Y. (1982). Asian families. In M. McGoldrick, J. K. Pearce, & J. Giordano (Eds.), *Ethnicity and Family Therapy* (pp. 208–228). New York, NY: Guilford.
- Sorkin, D. H., Nguyen, H., & Ngo-Metzger, Q. (2011). Assessing the mental health needs and barriers to care among a diverse sample of Asian American older adults. *Journal of General Internal Medicine, 26*, 595-602. doi:10.1007/s11606-010-1612-6
- Sue, S., & Morishima, J. K. (1982). *The mental health of Asian-Americans*. San Francisco, CA: Jossey-Bass.
- Sue, D. W. & Sue, D. (1990). *Counseling the culturally different: Theory and practice*. New York: Wiley.
- Sue, S., Zane, N., Hall, G., & Berger, L. K. (2009). The case for cultural competency in psychotherapeutic interventions. *Annual Review of Psychology, 60*, 525-548. doi:10.1146/annurev.psych.60.110707.163651
- Suinn, R. M. (2009). Acculturation: Measurements and review of findings. In N. Trinh, Y. Rho, F. G. Lu, K. Sanders (Eds.), *Handbook of mental health and acculturation in Asian American families* (pp. 3-23). Totowa, NJ US: Humana Press. doi:10.1007/978-1-60327-437-1_1
- Suinn, R. M., Rickard-Figueroa, K., Lew, S., & Vigil, P. (1987). The Suinn-Lew Asian Self-Identity Acculturation Scale: An initial report. *Educational and Psychological Measurement, 47*, 401-407. doi:10.1177/0013164487472012

- Takeuchi, D. T., Sue, S., & Yeh, M. (1995). Return rates and outcomes from ethnicity-specific mental health programs in Los Angeles. *American Journal of Public Health, 85*, 638-643. doi:10.2105/AJPH.85.5.638
- Takeuchi, D. T., Zane, N., Hong, S., Chae, D. H., Gong, F., Gee, G. C., & ... Alegria, M. (2007). Immigration-related factors and mental disorders among Asian Americans. *American Journal of Public Health, 97*, 84-90. doi:10.2105/AJPH.2006.088401
- Triandis, H. C., & Gelfand, M. J. (2012). A theory of individualism and collectivism. In P. M. Van Lange, A. W. Kruglanski, E. Higgins (Eds.) , *Handbook of theories of social psychology (Vol 2)* (pp. 498-520). Thousand Oaks, CA: Sage Publications Ltd.
- Uomoto, J. M., & Gorsuch, R. L. (1984). Japanese American response to psychological disorder: Referral patterns, attitudes, and subjective norms. *American Journal of Community Psychology, 12*, 537-550.
- United States Census Bureau. (2012). *Projections of the population by sex, race, and Hispanic origin for the United States: 2015 to 2060 – middle series* [Data file]. Retrieved from <http://www.census.gov/population/projections/data/national/2012/summarytables.html>
- Wang, P., Lane, M., Olfson, M., Pincus, K., & Kessler, R. C. (2005). Twelve month use of mental health services in the United States: Results from the National Comorbidity Survey Replication. *Archives of General Psychiatry, 62*, 629-640. doi:10.1001/archpsyc.62.6.629
- Weiss, B., Tram, J. M., Weisz, J. R., Rescorla, L., & Achenbach, T. M. (2009). Differential symptom expression and somatization in Thai versus U.S. children.

Journal of Consulting and Clinical Psychology, 77, 987-992.

doi:10.1037/a0016779

Young, K. (1998). Help-seeking for emotional/psychological problems among Chinese Americans in the Los Angeles area: An examination of the effects of acculturation. *Dissertation Abstracts International*, 58(12-B), 6833.

Zane, N., & Yeh, M. (2002). The use of culturally- based variables in assessment: Studies on loss of face. In K. S. Kurasaki, S. Okazaki & S. Sue (Eds.), *Asian American mental health: Assessment theories and methods* (pp. 123–137). New York, NY: Kluwer.

Appendix A: Referral scenarios

Physical/psychological symptoms, culturally competent

For this scenario, please imagine a friend similar to yourself in age, gender, and race is coming to you for advice. Lately, he or she has been experiencing increasingly high levels of anxiety. This friend has also been troubled by feelings of worthlessness. He or she has been especially tired recently, and has been having periodic stomach pain. This has been continuing for several weeks now.

Dr. Lee is a therapist who works at the on-campus counseling center who has recently moved to your school after a 10-year stint at the Asian Pacific Counseling and Treatment Center in Los Angeles. The APCTC is a county outpatient clinic that offers evaluation, individual and family counseling, and support groups to a primarily middle-class Asian American population. Clients range across all ages and genders. Therapy at the clinic involves modern cognitive-behavioral interventions that have been developed for Asian heritage cultures. Dr. Lee comes highly recommended by both colleagues and clients from this clinic.

Physical/psychological symptoms, not culturally competent

For this scenario, please imagine a friend similar to yourself in age, gender, and race who is coming to you for advice. Lately, he or she has been experiencing increasingly high levels of anxiety. This friend has also been troubled by feelings of worthlessness. He or she has been especially tired recently, and has been having periodic stomach pain. This has been continuing for several weeks now.

Dr. Lee is a therapist who works at the on-campus counseling center who has recently moved to your school after a 10-year stint at the Southern California Counseling and Treatment Center in Los Angeles. The SCCTC is a county outpatient clinic that offers evaluation, individual and family counseling, and support groups to a primarily middle-class Caucasian American population. Clients range across all ages and genders. Therapy at the clinic involves modern cognitive-behavioral interventions that have been developed for the general population. Dr. Lee comes highly recommended by both colleagues and clients from this clinic.

Psychological symptoms, not culturally competent

For this scenario, please imagine a friend similar to yourself in age, gender, and race who is coming to you for advice. Lately, he or she has been experiencing increasingly high levels of anxiety. This friend has also been troubled by feelings of worthlessness. He or she is unwilling to participate in previously enjoyed activities due to the belief that they are unlikely to succeed in any of their efforts. This has been continuing for several weeks now.

Dr. Lee is a therapist who works at the on-campus counseling center who has recently moved to your school after a 10-year stint at the Southern California Counseling and Treatment Center in Los Angeles. The SCCTC is a county outpatient clinic that offers evaluation, individual and family counseling, and support groups to a primarily middle-class Caucasian American population. Clients range across all ages and genders. Therapy at the clinic involves modern cognitive-behavioral interventions that have been

developed for the general population. Dr. Lee comes highly recommended by both colleagues and clients from this clinic.

Psychological symptoms, culturally competent

For this scenario, please imagine a friend similar to yourself in age, gender, and race who is coming to you for advice. Lately, he or she has been experiencing increasingly high levels of anxiety. This friend has also been troubled by feelings of worthlessness. He or she is unwilling to participate in previously enjoyed activities due to the belief that they are unlikely to succeed in any of their efforts. This has been continuing for several weeks now.

Dr. Lee is a therapist who works at the on-campus counseling center who has recently moved to your school after a 10-year stint at the Asian Pacific Counseling and Treatment Center in Los Angeles. The APCTC is a county outpatient clinic that offers evaluation, individual and family counseling, and support groups to a primarily middle-class Asian American population. Clients range across all ages and genders. Therapy at the clinic involves modern cognitive-behavioral interventions that have been developed for Asian heritage cultures. Dr. Lee comes highly recommended by both colleagues and clients from this clinic.

Appendix B: Post-vignette questionnaire

What is the likelihood that you would refer your friend to this health professional?
(Very unlikely, somewhat unlikely, neutral, somewhat likely, very likely)

What do you think is the likelihood that the symptoms were caused by a physical illness?
(Very unlikely, somewhat unlikely, neutral, somewhat likely, very likely)

What do you think is the likelihood that the symptoms were caused by a mental illness?
(Very unlikely, somewhat unlikely, neutral, somewhat likely, very likely)

How sensitive would you expect this professional to be towards cultural differences?
(Very unlikely, somewhat unlikely, neutral, somewhat likely, very likely)

How familiar are you with mental illness and its causes, symptoms, and treatment?
(Very unfamiliar, somewhat unfamiliar, neutral, somewhat familiar, very familiar)