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EDITORS

TIMOTHY G. PLAX

GREGORY S. ANDRIATE

WORLD COMMUNICATION ASSOCIATION
130 ARMSTRONG HALL
WEST VIRGINIA UNIVERSITY
MORGANTOWN, WV 26505, U.S.A.

COMMUNICATION APPREHENSION IN PUERTO RICO AND THE UNITED STATES I: INITIAL COMPARISONS

Joan M. Fayer, James C. McCroskey, Virginia P. Richmond

Communication apprehension (CA), an individual's level of fear or anxiety associated with either real or anticipated communication with another person or persons, has received extensive attention from both researchers and teachers in the United States over the past decade. The results of this research indicate CA is a major problem for a sizeable number of people in the general American culture (for a summary of much of this research see McCroskey, 1977, 1978).

While increasingly CA research is being directed toward populations other than those in the mainland U.S. culture, as we will note below, the vast bulk of this research can be said to share a strong cultural bias. Recently, the generalizability of the conclusions of this research to other cultures has been brought into question (McCroskey and Richmond, 1981; McCroskey, 1982). The present paper is addressed to this question of generalizability. Our purpose is to summarize available data on CA in contexts outside the mainland U.S. and report a preliminary study of CA in individuals whose primary language is Spanish.

PREVIOUS RESEARCH

One of the main difficulties that researchers have faced when seeking to obtain data from non-U.S. samples involves measurement. The various forms of the Personal Report of Communication Apprehension (PRCA) are all in English (McCroskey, 1970, 1978, 1982) and considerable difficulties in obtaining adequate translations of the instrument have been encountered. Consequently, most samples studied have represented other English-speaking cultures or English-speaking people from non-English-speaking cultures. The representativeness of the later group, of course, is questionable. The data available, therefore, must be considered only suggestive of the level of generalizability possible.

Fayer is Associate Professor at the University of Puerto Rico, McCroskey is Professor and Chairperson at West Virginia University, and Richmond is an Associate Professor at West Virginia University.

The most extensive cross-cultural comparison reported to date was conducted by Hansford and Hattie (1979). Their study involved 1784 Australians and 4542 Americans. Even with these very large samples, they found no significant differences between the U.S. and Australian groups, nor did they find any differences attributable to either sex or age. Klopf and Cambra (1979) have reported similar findings for Australians.

Research involving Asian cultures has presented a mixed picture. Klopf and Cambra (1979) report a higher incidence of CA among Japanese compared to the American norms and a similarly higher level among Hawaiian Americans. In contrast, they have observed substantially lower levels of CA among Koreans. Bruneau, Cambra, and Klopf (1980) found no differences between the American norms and those for Guamanians and a similar finding for mainland Chinese has been reported by Klopf and Cambra (1980).

Although CA and shyness are not isomorphic constructs (McCroskey, 1982), the work of Zimbardo (1977) has closely paralleled that of researchers working under the CA label. His work indicates a significantly higher proportion of shy people among Hawaiian Americans and Japanese, consistent with the findings of Klopf and Cambra (1979). His findings also indicate a substantially lower incidence of shyness among Israelies and Jewish Americans than that found among other groups.

While the data available are sparse, and the representativeness of some samples is questionable, it would appear that the incidence of CA in other English-speaking cultures differs little from the incidence in the U.S. However, it appears that while some cultures that are not English-speaking have CA norms similar to those in the U.S. others may differ substantially. Any cross-cultural generalization concerning normative levels of CA, therefore, must be made with extreme caution.

THE PRESENT STUDY

The present study was designed to provide a preliminary assessment of CA norms in a non-U.S. population whose primary language is not English. The sample selected for this investigation included students at the University of Puerto Rico, Rio Piedras.

This subject population was selected for several reasons. First, the overwhelming majority of Puerto Ricans are bilingual but primarily Spanish speaking. While their English proficiency typically is not at the level of individuals from the mainland U.S., they tend to be much more proficient in English than the majority of individuals from other Spanish-speaking cultures.

Because of the extensive U.S. influence in Puerto Rico, the opportunity for individuals to use English is much greater than in most other Spanish-speaking cultures. This is particularly true of college students at the University of Puerto Rico, where two years of study in English is required for all students. This English competence was particularly beneficial to this study because it permitted data collection with an instrument in English and did not require translation.

A second reason for the selection of this sample was the fact that although Puerto Ricans are U.S. citizens, they do not share the mainland U.S. culture. Rather, the culture of Puerto Rico, while unique in many respects, is heavily influenced by the Spanish heritage of the island. Communication in this culture, particularly as represented by nonverbal behaviors, is very distinct from the communication on the U.S. mainland. This diversity provided an excellent basis for comparison of CA between two cultures.

Finally, this population was selected for study because of the intuitive observations of many individuals from the U.S. mainland upon exposure to the Puerto Rican culture. Many have commented that the Puerto Rican people seem to enjoy speaking in public, particularly at meetings, and seem to be relatively free from obvious manifestations of CA. While such observations may be a function of ethnocentric distortion, because they are so common it was felt that this sample might have a higher probability of divergence from U.S. mainland norms than others that might have been selected.

METHOD

Sample. A total of 357 students at the University of Puerto Rico, Rio Piedras, provided usable data for this study. Of these, 341 reported Spanish to be their native language, 14 reported English, and 2 indicated another language. Only those reporting Spanish as their first language (N=341) were used for subsequent analyses.

CA Measurement. The 24-item version of the Personal Report of Communication Apprehension (PRCA; McCroskey, 1982) was employed. The subjects were asked to complete the instrument in terms of how they felt "WHEN I SPEAK IN SPANISH", and, separately, "WHEN I SPEAK IN ENGLISH". This version of the PRCA was chosen because it does not include the heavy public speaking bias in items common to the earlier versions of the instrument. In addition, this version permits generation of a total score and four subscores representing communication in 1) groups, 2) meetings, 3) interpersonal dyads, and 4) public speaking. An additional advantage of this version of

the PRCA is that norms from over 50 mainland universities and colleges are available for purposes of comparison.

Other Measures. Subjects were asked to complete a shyness measure based on the work of Zimbardo (1977). Separately for Spanish and English, the subjects were asked to respond to the question "Do you presently consider yourself to be a shy person?" Those who answered yes to this question were asked "Do you consider your shyness to be a problem? In other words, would you rather not be shy?" For those who answered no to the first question, the follow-up question was "Was there ever a period in your life during which you considered yourself to be a shy person?" These combinations of questions permitted classification of the subjects into four categories: 1) not presently shy, never was; 2) not presently shy, was previously; 3) shy, not a problem, 4) shy, is a problem. As with the PRCA, norms from over 50 mainland universities and colleges are available for comparison on this measure.

To obtain an indication of the proficiency of the subjects in both Spanish and English, the subjects were asked to rate their proficiency in each language on a scale of 1-5. This measure was chosen to permit determining whether competence in a language is related to CA in that language. While it was recognized that a self-report of this type is likely to be biased in favor of a positive correlation with CA, other options were deemed even more problematic. For example, a written test of proficiency was rejected because previous research has indicated a very low relationship between CA in oral communication and CA in written communication. In addition, written proficiency has no necessary relationship with oral proficiency. Similarly, observation of oral proficiency was rejected as an option because of the difficulty in obtaining adequate observations across a variety of communication settings. In addition, it was believed that such observations might be heavily biased by the CA level of the student, such that confidence in oral performance may be viewed as an important part of oral proficiency.

Finally, the subjects were asked to indicate their sex. Previous research (McCroskey, Simpson & Richmond, 1982) clearly has demonstrated that there are no meaningful differences between males and females on either CA or shyness in samples from the mainland U.S. However, the cultural distinctions between males and females in the Puerto Rican culture differ substantially from male-female distinctions in the contemporary U.S. culture. Thus, it was deemed important to determine whether any differences in CA or shyness could be attributed to sex in this sample.

RESULTS

Preliminary Analyses. The first step in the data analyses was determining whether the PRCA was a stable measure for use with this population, since it had not been administered previously to a Spanish-speaking population. A series of factor analyses were performed. First, the items on the PRCA were factor analyzed separately for each language. The results indicated the preferred solution in each case was a single factor, since all items were loaded above .60 on the first unrotated factor and the eigenvalue for the second factor in each case was 2.00, with the eigenvalue for subsequent factors 1.00. The results indicated that the measure was measuring a single construct in each case, presumably CA.

Two additional factor analyses were performed to determine whether the measure was measuring general CA in both administrations or two different forms of CA, as was assumed initially. In the first of these analyses all 48 items were entered (24 from Spanish version, 24 from English version). In the second analysis, eight subscores were entered (4 from Spanish and 4 from English). The results of both analyses indicated the combined measures were measuring two distinct constructs. Table 1 reports the individual item factor loadings and Table 2 reports the loadings for the subscore analysis. As is noted in these tables, all of the English items/subscores load on one factor while all of the Spanish items/subscores load on another factor. While clearly factorially distinct, the constructs are correlated. The oblique rotation analysis generated a correlation of .43 for the individual item factors and a correlation of .48 for the subscore factors. Thus, it was concluded that the measure was performed as intended.

Alpha reliability estimates were computed for the PRCA total scores and the subscores for both the Spanish and English administrations. The reliabilities, reported in Table 3, were high and comparable to administrations of the instrument in studies of mainland U.S. subjects.

Major Analyses. Table 4 reports the mean scores on the PRCA and each of the subscores for the present sample for both speaking in Spanish and speaking in English. In addition, means of samples from mainland groups are included for purposes of comparison. The "Pharm" group represents data from 10,233 students enrolled in 52 schools of pharmacy throughout the U.S. The "WVU" group represents black students. The "Oriental" group represents 467 Oriental students. The "Hispanic" group represents 189 Hispanic students. The latter three groups are all subsets of the larger "Pharm" group.

As can be seen in Table 4, the subjects in the present study generated both the highest (for English speaking) and the lowest (for Spanish speaking) means among the various samples. Thus, this Puerto Rican sample can be said to have the lowest level of CA or the highest level of CA of any major group sampled, depending on the language in which they are speaking. This is illustrated further in Table 5. That table reports the proportion of subjects in each sample falling into High, Moderate, and Low CA categories. These categories employ the mean on the total PRCA score from the WVU sample (the largest sample to date) as the base, with subjects scoring beyond one standard deviation above the mean as high CA and those scoring beyond one standard deviation below the mean as low CA.

Table 6 reports the percentage of subjects from each of the samples noted above which fall into the four shyness categories discussed earlier. As was the case with CA, the data from the Puerto Rican sample falls near the extremes, depending on language being employed.

Supplementary Analyses. Since the present sample deviated so substantially from the norms based on mainland U.S. samples, it is important to determine whether any variable other than culture can satisfactorily explain the deviation. Supplementary analyses were performed to provide information in this area.

The first set of analyses considered the sex of the subjects. Since approximately two-thirds of the subjects in this sample were males (226 of 341), if the male scores were substantially lower for Spanish and/or higher for English, this could account for at least some of the group differences observed. The analyses relating to CA in Spanish yielded non-significant (F 1.00 in all cases) results for the total PRCA and for each subscore. The mean for males and females were virtually identical. These results are consistent with similar analyses for all of the other samples used for comparison. Apparently, when speaking in one's native language, CA is not a function of the sex of the individual.

The analyses relating to CA in English yielded significant results for the total PRCA and for each of the subscores except that concerned with group communication. In each case males reported higher CA than females. The importance of this find, however, is questionable. The sex variable accounted for no more than two percent of the variance in scores in any analysis. Nevertheless, males in this study experience somewhat more CA when speaking in their second language than do the females. Consultation with our colleagues involved in foreign language instruction leads us to believe that this observation may not be unique to the sample studied but may be common to males and females

in many cultures.

The second set of analyses considered language proficiency as a predictor of CA. Table 7 reports the correlations between proficiency and CA for both languages. As can be seen in that table, proficiency had very little relationship with CA in Spanish, but was substantially related to CA in English. The mean proficiency reported for Spanish was 3.81, while for English it was 2.81. Thus, not only was proficiency correlated with CA, but CA was very much higher in the second language in which proficiency was reported as comparatively low. This result can serve to explan the unusually high average CA reported for these subjects when speaking in a second language (English). However, proficiency in language cannot be employed to explain CA generally, since the correlations between proficiency and CA in the first language (Spanish) are so low as to be meaningless. It would appear, then, that low proficiency greatly enhances CA in a second language. However, we suspect, on the basis of the Spanish results, that once proficiency reaches some moderate level, proficiency and CA are unrelated. In subsequent research this speculation will be tested directly. In support of this speculation, research by Allen, Andriate, and Cuzick (1982) has indicated that students assigned to "basic skills" classes because of deficient language skills in a mainland U.S. university report no higher CA than students assigned to regular classes. We speculate that these students find their own language proficiency at least moderately adequate (comparable to our present sample when speaking in Spanish) even though the university considers them deficient.

The third set of supplementary analyses explored the correlations of CA scores and shyness levels between Spanish and English. Conflicting predictions were made concerning the direction of the correlations expected. From the vantage point of theory concerning CA, it would be expected that a higher level of CA in ones native language would be positively related to a higher level of CA in a second language, in other words a generalizable CA trait. An alternate view is that people who have very low CA in their native language may have more difficulty with communication in a second language, such that low CA in ones native language would be negatively related to low CA in a second language.

Table 8 reports the obtained correlations between Spanish and English for the total PRCA and for each of the subscores. As noted in that table, all of the obtained correlations were positive and in the moderate range. Thus, the predictions based on the theory of CA as a generalized trait are supported. The shyness results were very similar to the CA results. On the first shyness question, concerning whether the person presently is shy, the phi correlation obtained was .75, $p<.0001$. Similarly, the contingency

coefficient was .81, $p<.0001$, for the relationship between the full four levels of shyness between Spanish and English. Thus, it is appropriate to conclude that shyness, as measured in this study, is a strong generalized trait that crosses between native and second language communication. However, it should be noted that shyness in the second language was more common than in the first language. While 42 subjects reported they were shy in English but not in Spanish, only two subjects reported being shy in Spanish but not in English.

Of particular interest to teachers working with second language instruction are the comparative contributions of language proficiency and general CA to CA in the second language. The implicit assumption in much second language instruction is that apprehension concerning the language will be reduced as proficiency increases. The final supplementary analyses examined this question.

Multiple regression analyses were computed to determine the individual and combined predictive power of language proficiency in English and CA in Spanish in terms of CA in English. The results indicated that both variables were significant predictors of total PRCA scores in English as well as each of the subscores. As noted in Table 9, CA in Spanish was the superior predictor in all cases except the subscores for dyadic communication. The degree of colinearity of the predictors was negligible. These results suggest that the assumption that increased proficiency will reduce apprehension about a second language is tenable. However, the results also suggest that there probably is a critical point beyond which increased proficiency will have no additional impact on reducing such apprehension. That point is determined by the individual's CA level in her or his native language.

CONCLUSIONS

The results of this study suggest several conclusions. Before turning to these, however, several limitations of the study need to be noted. It must be stressed that this is a preliminary study with a sample of only 341 subjects. Subjects were obtained on an availability basis, thus may not be fully representative of the population from which they were drawn. Subsequent data collection will permit a substantial increase in the sample size and much more confidence in the generalizability of the results to the Puerto Rican student population.

Since the main concern of this line of research is the generalizability of earlier CA research across cultures, it also must be stressed that this study focused on a single cultural group with comparisons to mainland U.S. data. Obviously, many other

cultural groups must be studied before firm conclusions can be drawn.

Within the context of these limitations, several preliminary conclusions may be drawn from the results of this study. First, it appears that the PRCA can be employed with some confidence with subjects who are bilingual but not native speakers of English. The reliability and factoral stability of the instrument observed in this study are very encouraging. Of course, this does not obviate the need to overcome the problems of translation of the PRCA to other languages for use with non-bilingual subjects and bilingual subjects for whom English is not a second language.

The most striking result of this study is the comparatively low average CA level of the Puerto Rico subjects when speaking in their native language. Presuming this finding can be replicated with a larger sample, it will be particularly challenging to determine the cultural factors which may be causal contributors to this result. If such factors can be isolated this may make a major contribution toward determining the causal foundation of CA itself, something that currently is only the subject of speculation by writers in the area.

The results of the supplementary analyses suggest several important conclusions. First, sex does not appear to be a meaningful contributor to CA for a person speaking in their native language. The results of the data with large samples from the mainland U.S. population as well as the current results point to this conclusion. Thus, if sex differences are observed in samples from other cultures, we should look to the culture as the explanation for the observation rather than the sex of the individual.

The finding that CA is higher in a second language should not come as a surprise to anyone. Nor should the finding that proficiency in a second language is positively related to reduced CA in that language. However, the finding that proficiency in an individual's native language is not meaningfully related to CA in that language should give us some pause. While language proficiency and communicative competence are not isomorphic constructs, they are similar enough to cause us to question the utility of communication skills instruction as a method of reducing CA. CA is an affective response of the individual and may be unrelated to the competence or performance skills of that individual in their native language.

REFERENCES

Allen, J. L, Andriate, G. S. & Cuzick, R. A comparison of communication apprehension in basic studied and non-basic studies students. Paper presented at the Eastern Communication Association Convention, Hartford, 1982.

Bruneau, T., Cambra, R. E. & Klopf, D. W. Communication apprehension: Its incidence in Guam and elsewhere. Paper presented at the Communication Association of the Pacific Convention, Agana, Guam, 1980.

Hansford, B. C. & Hattie, J. A. Communication apprehension: An assessment of Australian and United States data. Unpublished paper, University of New England, Australia, 1979.

Klopf, D. W. & Cambra, R. E. Apprehension about speaking among college students in the People's Republic of China. Psychological Reports, 1980, 46, 1194.

Klopf, D. W. & Cambra, R. E. Communication apprehension among college students in America, Australia, Japan, and Korea. The Journal of Psychology, 1979, 102, 27-31.

McCroskey, J. C. Introduction to rhetorical communication. 4th Ed., New Brunswick, NJ: Prentice-Hall, 1982a.

McCroskey, J. C. Oral communication apprehension: A reconceptualization. In M. Burgoon, Ed., Communication Yearbook 6, Beverly Hills, CA:: Sage, 1982b.

McCroskey, J. C. Validity of the PRCA as an index of oral communication apprehension. Communication Monographs, 1978, 45, 192-203.

McCroskey, J. C. Oral communication apprehension: A summary of recent theory and research. Human Communication Research, 1977, 4, 78-96.

McCroskey, J. C. Measures of communication-bound anxiety. Speech Monographs, 1970, 37, 269-277.

McCroskey, J. C. & Richmond, V. P. The etiology and effects of communication apprehension: Cross-cultural implications. Paper presented at the Puerto Rican Speech Communication Association Convention, San Juan, 1981.

McCroskey, J. C., Simpson, T. & Richmond, V. P. Biological

sex and communication apprehension. Communication Quarterly, 1982, 30, 129-133.

Zimbardo, P. G. Shyness: What it is and what to do about it. Reading, MA: Addison-Wesley, 1977.

Table 1
Factor Loadings of Items in Spanish
and English PRCA Responses

Item	Factor 1	Factor 2	Item	Factor 1	Factor 2
S1*	.04	.50	E1	.64	-.04
S2	.03	.48	E2	.71	-.08
S3	-.02	.63	E3	.63	.10
S4	-.06	.52	E4	.63	-.04
S5	.11	.60	E5	.56	.11
S6	-.07	.74	E6	.73	.06
S7	.12	.67	E7	.64	.14
S8	.08	.70	E8	.75	.05
S9	.08	.57	E9	.70	.00
S10	.08	.56	E10	.60	.07
S11	.00	.52	E11	.45	.13
S12	.06	.54	E12	.66	-.06
S13	-.01	.68	E13	.69	.05
S14	.02	.50	E14	.73	-.07
S15	-.08	.63	E15	.78	.01
S16	-.08	.64	E16	.80	-.05
S17	-.01	.62	E17	.75	-.03
S18	.00	.57	E18	.75	-.10
S19	.06	.53	E19	.64	.03
S20	.05	.45	E20	.48	.09
S21	.01	.64	E21	.64	-.03
S22	-.07	.60	E22	.54	.02
S23	.09	.44	E23	.44	.05
S24	.07	.57	E24	.57	.07

*S = Spanish, E = English. For wording of items see Apendix A.
All items converted to equal polarity before analysis.

Table 2
Factor Loadings of Subscores in Spanish and English PRCA Responses

Subscore	Factor 1	Factor 2
Spanish		
Group	-.01	.78
Meeting	.08	.80
Dyad	-.04	.78
Public	.06	.70
English		
Group	.85	.02
Meeting	.85	.05
Dyad	.89	-.04
Public	.73	.05

Table 3
Reliabilities of CA Scores

Score	Spanish	English
PRCA Total	.94	.96
Group	.82	.84
Meeting	.84	.86
Dyad	.84	.85
Public	.81	.84

Table 4
Mean CA Scores for Puerto Rico
Sample and Comparison Groups

Sample	Total PRCA	CA Score Group	Meeting	Dyad	Public
Puerto Rico					
Spanish	59.0	13.1	16.2	13.2	16.4
English	74.7	17.7	19.6	18.0	19.5
Pharm	65.2	15.5	16.4	14.5	18.7
WVU	65.6	15.3	16.3	14.1	19.9
Black	59.9	14.2	15.2	13.6	16.9
Oriental	71.2	17.1	18.1	16.4	19.6
Hispanic	67.6	16.4	17.2	15.1	18.8

Table 5
Percentage of Subjects at Various CA Levels

Sample	Low CA	Moderate CA	High CA
Puerto Rico			
Spanish	32.4	57.1	10.5
English	12.5	44.6	42.9
Pharm	19.9	60.5	19.6
WVU	16.0	68.0	16.0
Black	30.0	57.5	12.5
Oriental	8.8	60.8	30.4
Hispanic	15.9	59.3	24.9

Table 6
Percentage of Subjects in Various Shyness Categories

Sample	Not Shy	Previously Shy	Shy, No Problem	Shy, Is A Problem
Puerto Rico				
Spanish	16.1	54.6	10.5	18.8
English	12.0	47.5	12.7	27.8
Pharm	19.6	46.4	15.9	18.2
WVU	20.1	46.7	15.9	17.4
Black	19.6	47.4	14.1	18.9
Oriental	11.2	40.8	18.4	29.6
Hispanic	17.1	44.9	16.6	21.4

Table 7
Correlations of Language Proficiency and CA

CA Score	Spanish	English
PRCA Total	.14*	.36**
Group	.13*	.30**
Meeting	.12*	.32**
Dyad	.14*	.36**
Public	.08	.24**

*p<.05
**p<.0001

Table 8
Correlations Between CA in Spanish and CA in English*

PRCA Total				
.46	.36	.49	.35	.48

*All correlations are significant, p<.0001.

Table 9
Percentage of Variance in English CA Scores
Attributable to English Proficiency and Spanish PRCA

	Source of Variance			
English CA Score	English Proficiency	Spanish PRCA	Colinearity	Total Variance
Total PRCA	10.2*	17.9*	3.5	30.6*
Group	7.4*	16.3*	1.7	25.4*
Meeting	7.2*	16.6*	1.8	25.6*
Dyad	12.7*	10.4*	2.3	25.4*
Public	4.8*	13.0*	1.6	19.4*

*Statistically significant, p<.0001.

Appendix A
PRCA Instrument

Directions: This instrument is composed of 24 statements concerning your feelings about communication with other people. Please indicate in the space provided the degree to which each statement applies to you by marking whether you (1) Strongly Agree, (2) Agree, (3) Are Undecided, (4) Disagree, (5) Strongly Disagree with each statement. There are no right or wrong answers. Many of the statements are similar to other statements. Do not be concerned about this. Work quickly, just record your first impression.

_____ 1. I dislike participating in group discussions.
_____ 2. Generally, I am comfortable whil participating in group discussions.
_____ 3. I am tense and nervous while participating in group discussions.
_____ 4. I like to get involved in group discussions.
_____ 5. Engaging in a group discussion with new people makes me tense and nervous.
_____ 6. I am calm and relaxed while participating in group discussions.
_____ 7. Generally, I am nervous when I have to participate in a meeting.
_____ 8. Usually I am calm and relaxed while participating in meetings.
_____ 9. I am very calm and relaxed when I am called upon to express an opinion at a meeting.
_____10. I am afraid to express myself at meetings.
_____11. Communicating at meetings usually makes me uncomfortable.
_____12. I am very relaxed when answering questions at a meeting.
_____13. While participating in a conversation with a new acquaintance, I feel very nervous.
_____14. I have no fear of speaking up in conversations.
_____15. Ordinarily I am very tense and nervous in conversations.
_____16. Ordinarily I am very calm and relaxed in conversations.
_____17. While conversing with a new acquaintance, I feel very relaxed.
_____18. I'm afraid to speak up in conversations.
_____19. I have no fear of giving a speech.
_____20. Certain parts of my body feel very tense and rigid while giving a speech.
_____21. I feel relaxed while giving a speech.
_____22. My thoughts become confused and jumbled when I am

giving a speech.

_____23. I face the prospect of giving a speech with confidence.

_____24. While giving a speech I get so nervous, I forget facts I really know.

SCORING:

Group = 18 - (1) + (2) - (3) + (4) - (5) + (6)
Meeting = 18 - (7) + (8) + (9) - (10) - (11) + (12)
Dyadic = 18 - (13) + (14) - (15) + (16) + (17) - (18)
Public = 18 + (19) - (20) + (21) - (22) + (23) - (24)
Overall CA = Group + Meeting + Dyadic + Public