Validation of Recognition of Cultural Values Subscale of Cultural Worldview Scale among Nigerians

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***Abstract* – A total of 173 participants (84, 48.6% females and 89, 51.4% males) participated in this study aimed at determining if factor 2, Recognition of Cultural Values Subscale of Cultural Worldview Scale (CW scale) developed by Choi, Papandrea, and Bennett, (2007) would be valid for use among Nigerians or not. Kaiser- Meyer – Olkin Measure of sampling adequacy (KMO) test had good values, likewise Bartlett's test of Sphericity is highly significant and value of communality for each variable (items) hold diagonal value more than 0.5. Based on Rule of thumb for Cronbach's alpha as recommended by Gliem and Gliem (2003), findings of this study revealed that among females (n=84) the subscale showed good internal consistency, α = 0.811, among males (n=89) the subscale showed questionable internal consistency α = 0.660 and among females/males (n=173) the subscale reached acceptable internal consistency α = 0.757. It is therefore, concluded that Recognition of Cultural Values Subscale of CW scale can be used among Nigerians.**

Keywords: **validation, recognition, cultural values, subscale, cultural worldview, Nigerians**

I. INTRODUCTION

Culture is important for all the things we do in the world. However it is a difficult term to define (Lebrón, 2013). Culture is defined as the norms, values, and beliefs of a group of people or community in a particular area or geographic location, and shared by its members (Hofstede, 1984). Lee (2006) defines culture as values and beliefs, or a cluster of learned behaviors that we share with others in a particular society, giving us a sense of belongingness and identity. Cultural value is viewed as the perceived economic significance of cultural goods and services this explains why some people attach more importance to the same degree of conservation activities involving cultural heritage than others (Choi, et al 2007). The core aspect of culture is shared values. Shared cultural values are derived through analyzing individual's value priorities at the cultural level (Vauclair, 2009). The lenses we view the world with are referred to as worldview (Ivey, Ivey, & Simek- Morgan, 1997). Cultural worldviews explains preferences for ways of life (Lord, 2018). An individual's ethnic-cultural background is significant in shaping a person's worldview (McGoldrick, 2005). Therefore, Koltko-Rivera (2004) defines worldview as beliefs and assumptions that describe reality pertaining to nature of life, human nature, and the composition of the universe.

Cultural value is multidimensional, thus its measurement is often elusive (Choi, et al 2007). Based on confirmatory factor analyses Cultural Worldview scale (CW scale) can be used as a single second-order factor or four associated factors. The short version of CW scale with twelve items can be used among non-Western nations (Choi, & Fielding, 2016). Four factors comprise the CW scale, cultural linkages, recognition of cultural values, cultural loss, and preservation of traditions and customs (Choi et al 2007). Culture has different dimensions likewise measurement of culture differs. What is valued in culture 'A' may not be valued in culture 'B' 'C' or 'D'. Cultural values differ among cultures across the world. To the best of the researcher's knowledge, Cultural Worldview scale or any of the CW scale subscales has not been validated among Nigerians. Therefore, the problem identified in this study is to validate recognition of diverse cultural value subscale of cultural worldview scale among Nigerians. This is in line with the position of Choi and Fielding (2016) that CW scale can be use among non-Western nations. Therefore this study is aimed at determining if factor 2 "*Recognition of Cultural Values Subscale*" of CW scale developed by Choi, et al (2007) would be valid for use among Nigerians or not.

II. METHOD

Research design/sampling technique

Participants that participated in this survey utilizing quantitative approach were purposively selected across 4 Local Government Area's (LGAs) of Plateau State Nigeria.

Participants

A total of 173 participants (84, 48.6% females and 89, 51.4% males) participated in this study. Minimum age of participants was 18 while maximum age was 63 with mean age of 31.98. Participants were drawn from 4 LGAs of Plateau State Nigeria, majority 77(44.51%) were drawn from Bassa LGA, 63(36.42%) were drawn from Jos-North LGA, 18(10.40%) from Barkin Ladi LGA and 15(8.67%) from Jos-South LGA.

III. INSTRUMENT

Cultural Worldview Scale

Cultural Worldview Scale (CW scale) developed by Choi, et al (2007) has four factors, cultural linkages (Factor 1), recognition of cultural values (Factor 2), cultural loss (Factor 3), and preservation of traditions and customs (Factor 4). Two versions of the scale with 18 similar items were applied in two separate surveys [studies on Old Parliament House (OPH) and the National Museum of Australia (NMA)] in Canberra, Australia (Choi, et al 2007). The final version of the scale has 19 items, factors 1 and 2 have 6 items each, and factors 3, and 4 respectively have 3 and 4 items (Choi, et al 2007). Results from factor analysis for OPH revealed reliability coefficient (Cronbach's alpha) representing internal consistency of each factor showed the following Cronbach's alpha; factor 1 (0.81), factor 2 (0.74), factor 3 (0.72) and factor 4 (0.83). Furthermore, results from factor analysis for NMA version revealed that factor 1 has Cronbach's alpha of 0.73, factor 2, $\alpha = 0.76$, factor 3, $\alpha = 0.69$ and factor 4, $\alpha = 0.72$ (Choi, et al 2007).

Procedure

The researcher in company of 4 research assistants purposively collected data among residents of 4 LGAs of Plateau state Nigeria. Only those that consent to participate were included. Consent to participate was sought individually from those that participate in the study.

IV. RESULT

Table 1: Demographic characteristics of participants

	Females		Males		Females/Males	
	Frequency	Percent (%)	Frequency	Percent (%)	Frequency	Percent (%)
Minimum age	19		18		18	
Maximum age	63		60		63	
Mean age	30.11		33.74		31.98	
Gender						
Female	84	100.0	-	-	84	48.6
Male	-	-	89	100.0	89	51.4
Religion						
Christian	66	78.6	76	85.4	142	82.1
Muslim	18	21.4	12	13.5	30	17.3
Others	-	-	1	1.1	1	0.6
Educational Status						
Primary School	12	14.3	7	7.9	19	11.0
Secondary School	25	29.8	21	23.6	46	26.6
Higher Institution	45	53.6	57	64.0	102	59.0
School Dropout	2	2.4	4	4.5	6	3.5

Results of table 1 showed that the total of 173 participants participated in this study with the minimum and maximum age of 18 and 63 years respectively and mean age of 31.98. Majority 89(51.4%) of the participants were males. In terms of religion there were more 142(82.1%) Christians compared to Muslims and those that identify their religion as others. Majority 102(59.0%) of the participants had higher education

Table 2: KMO and Bartlett's Test

		Females	Males	Females/Males
Kaiser-Meyer-Olkin Measure of Sampling Adequacy		.770	.671	.768
Bartlett's Test of Sphericity	Approx. Chi-Square	197.619	157.750	339.022
	Df	15	15	15
	Sig.	.000	.000	.000

Result of table 2 showed that Kaiser-Meyer-Olkin Measure of Sampling Adequacy (KMO) test based on Kaiser (1974) recommendation of accepting values greater than 0.5 reached acceptable values between 0.5 and 0.7 (mediocre) and between 0.7 and 0.8 (good). In this study, data of females, males and males/females showed the values of 0.770, 0.671 and 0.768 respectively, which falls between being mediocre (males only) and good (females and females/ males). This implies that factor analysis is appropriate for the data in this study. Furthermore, result of table 2 also showed that Bartlett's test of Sphericity is highly significant for females, males and females/males ($p < 0.001$); this implies that factor analysis is appropriate.

Table 3: Communality statistics for recognition of cultural values variable

		Females		Males		Females/males	
S/N		Initial	Extraction	Initial	Extraction	Initial	Extraction
1.	Culture does not help me to identify myself	1.000	.728	1.000	.722	1.000	.726
2.	Cultural heritage does not mean anything to my wellbeing	1.000	.735	1.000	.771	1.000	.834
3.	Students do not need to learn what their culture is	1.000	.742	1.000	.660	1.000	.546
4.	We do not need to care about cultural heritage	1.000	.678	1.000	.675	1.000	.648
5.	Buildings, museums, and paintings do not have the right to be preserved	1.000	.689	1.000	.639	1.000	.636
6.	Ideas, beliefs, and customs do not have the right to be preserved	1.000	.794	1.000	.730	1.000	.653

Extraction Method: Principal Component Analysis.

Table 3 showed that the value of communality for each item (CW scale items 1 - 6 for females, males and females/males) were more than acceptable value of 0.5. Only communality for female/male on item 3 "*Students do not need to learn what their culture is*" revealed a value of 0.546. Thus, it can be further analyzed that all items hold diagonal value more than 0.5. Hence no item would be omitted from the list.

Table 4: Total variance explained for recognition of cultural values variables (females only)

Component	Initial Eigenvalues			Extraction Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	3.179	52.987	52.987	3.179	52.987	52.987
2	1.187	19.786	72.772	1.187	19.786	72.772
3	.583	9.721	82.493			
4	.474	7.903	90.397			
5	.328	5.462	95.859			
6	.248	4.141	100.000			

Table 4 contains information regarding 6 possible factors for females only and their relative explanatory power as expressed by their eigenvalues. There are total two factors having eigenvalues more than 1. Hence, the two factors are retained for further study. Total variance explained by the two factors is 72.772 percent. This is a fair percent of variance to be explained and assumes appropriateness of the factor analysis.

Table 5: Total variance explained for recognition of cultural values variables (males only)

Component	Initial Eigenvalues			Extraction Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	2.653	44.211	44.211	2.653	44.211	44.211
2	1.390	23.159	67.370	1.390	23.159	67.370
3	.707	11.789	79.159			
4	.596	9.930	89.089			
5	.406	6.763	95.852			
6	.249	4.148	100.000			

Table 5 contains information regarding 6 possible factors for males only and their relative explanatory power as expressed by their eigenvalues. There are total two factors having eigenvalues more than 1. Hence, researcher has retained these two factors for further study. Total variance explained by the two factors is 67.370 percent. This is a fair percent of variance to be explained and assumes appropriateness of the factor analysis.

Table 6: Total variance explained for recognition of cultural values variables (females/males)

Component	Initial Eigenvalues			Extraction Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	2.911	48.516	48.516	2.911	48.516	48.516
2	1.285	21.418	69.934	1.285	21.418	69.934
3	.616	10.263	80.197			
4	.489	8.154	88.352			
5	.400	6.662	95.013			
6	.299	4.987	100.000			

Table 6 contains information regarding 6 possible factors for females/males and their relative explanatory power as expressed by their eigenvalues. There are total of two factors having eigenvalues more than 1. Hence, researcher has retained these two factors for further study. Total variance explained by the two factors is 69.934 percent. This is a fair percent of variance to be explained and assumes appropriateness of the factor analysis.

Table 7: Reliability statistics for recognition of cultural values subscale

Females			Males			Females/males		
Cronbach's Alpha	Mean	Variance	Cronbach's Alpha	Mean	Variance	Cronbach's Alpha	Mean	Variance
.811	23.37	42.814	.660	23.70	28.327	.732	23.54	35.180

Result of table 7 showed that recognition of cultural value subscale of CW scale using only female participants reached acceptable internal consistency of $\alpha = 0.811$, mean score of 23.37 and variance of 42.814. Among male participants the scale reached a questionable internal consistency of $\alpha = 0.660$, mean score of 23.70 and variance of 28.327. Furthermore, for females/males the scale reached acceptable internal consistency of $\alpha = 0.732$, mean score of 23.54 and variance of 35.180.

V. DISCUSSION

Findings of this study showed that Recognition of Cultural Value sub- scale of CW scale is valid and reliable for use among Nigerians. Kaiser- Meyer – Olkin Measure of sampling Adequacy (KMO) test had good values, also Bartlett's test of Sphericity is highly significant. This indicates that the factor analysis is good. Value of communality for each item for females, males and females/males hold diagonal value more than 0.5 as recommended by Kaiser (1974), hence no variable was omitted from the list, all 6 items by Choi et al (2007) were retained. Furthermore reliability analysis showed that the scale has good internal consistency. The decision rule for acceptable reliability (internal consistency) is based on Gliem and Gliem (2003) rule of thumb for Cronbach's alpha: "– >.9 – Excellent, – >.8 – Good, – >.7 – Acceptable, – >.6 – Questionable, – >.5 – Poor, and – <.5 – Unacceptable. Based on recommended by Gliem and Gliem (2003), findings in this study reached good reliability $\alpha = 0.811$ among female (n=84) participants, questionable reliability $\alpha = 0.660$ among male (n=89) participants and acceptable internal consistency $\alpha = 0.757$ among females/males (n=173). Similarly, Choi, et al (2007) found $\alpha = 0.74$ for factor 2 of OPH study and $\alpha = 0.76$ for factor 2 of NMA study. Findings of this present study revealed that the minimum score one can get on Recognition of Cultural Values is 6 while the maximum score is 30. The mean score and or cut off score is 23.54, approximately 24, this implies that score higher than the mean indicate positive recognition of cultural values while scores lower than the mean indicate negative recognition of cultural values.

VI. CONCLUSION

Findings of this study showed that factor 2 "*Recognition of Cultural Values Subscale*" of CW scale is found valid and reliable for use among Nigerians. Using only female participants the scale showed good internal consistency, using only male participants the scale showed questionable internal consistency, but using both female/males the scale showed acceptable internal consistency. This implies that Recognition of Cultural Values Subscale of CW scale has good internal consistency and can be used among Nigerians.

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