The Development of a Reliable and Valid Instrument to Assess Students’ Attitudes towards Diversity, Violence, and their Perceived Need for Education on Diversity

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Abstract
Violations against heritage sites and minorities in the Middle East fuel the cycle of sectarian vengeance and violence (Ki-moon, 2014), and destroy the unity of human culture, the diversity and the cultural exchanges between cultural civilizations (Hamoudi, 2014). Consequently, if living in the midst of the fog of war is a daunting task (Bhabha, 2014), and if it is time to act (Dieng, 2014), then educating Syrian and Iraqi refugees and Lebanese students to resent violence and embrace a diverse society is no more an option to think about, it is a necessity. Few measures exist to assess whether students embrace diversity, resent violence, and show a perceived need to be educated further on how to be responsible citizens. In this study, the researcher developed a valid and reliable instrument to explore diversity in the perspectives of Lebanese and Syrian students in Lebanon. The instrument, “Students’ Attitudes towards Diversity and Violence and their perceived need for Education on Diversity Evaluation Form” (SADVEEF), assessed three factors: (a) students’ attitude towards diversity, (b) students’ attitude towards violence, (c) students’ perceived needs for education on diversity. The researcher gathered data from students of different ages, sex, races, ethnic groups, religions and religious sects. The instrument is evaluated, and how it might benefit education research and practice in the assessment of diversity related goals is considered. Using SADVEEF instrument will help draw the attention of policy makers that there is an urgent need to mold the curriculum to help cure and deal with the insecurities of refugee students and students living sectarian wars.

Keywords: violence; diversity; education; students’ attitudes, religion

INTRODUCTION
The Lebanese population is religiously diverse, reflecting the country’s rich heritage and history as an enclave of various Christian sects, Sunni and Shiite Muslims, Alawites, and the Druze. For most of its independent existence, Lebanon has been torn by intermittent civil conflict and political battles between rival religious sects and ideological groups (Blanchard, 2014). Recently, the civil war in neighboring Syria has progressively destabilized Lebanon (Gilsinan, 2015). Tensions have spilled over from Syria into Lebanon with deadly clashes or bombing between Sunni Muslims and Alawites in Tripoli (Kalim, 2013), or Sunni ISIS or Nusra supporters and the Shiites in Beirut (Smyth, 2015).

Syria’s conflict has so far killed 220,000 people, displaced half of the country’s population, facilitated the rise of ISIS (Gilsinan, 2015), and fueled the cycle of sectarian vengeance and violence (Ki-moon, 2014). Iraqi and Syrian people are being persecuted and chased from their homes because of their cultural and religious backgrounds (Bokova, 2014). Lebanon is also greatly affected. In 2014, almost 1.2 million refugees (including 45,000 Palestine refugees from Syria) were registered by the United Nations Refugee Agency (King, 2014). In March 2015, it was estimated that 1.2 million Syrian refugees lived in Lebanon (International Labor Organization, 2015). Some refugees bring with them extremist thoughts and start disseminating these ideas with further calls to action which result in fights such as the fight which happened in Orsal, Bekaa in August 2014 (Al-Fakih, 2014). On the other hand, students in Lebanon support certain social and religious sects and thus experience the religious and social gaps that have taken place in the Middle East. While education is a vital resource in the fight against fanaticism as it provides a platform for populations to forge collective identities (Bokova, 2014). No instrument has been developed to examine the diverse attitudes of future generations within the Lebanese context. Thus, although an acceptance of diversity is vital in preparing students to live in a pluralistic and multicultural democracy (Moses & Chang, 2006; Smith, 2009), the way schools and refugee camps in Lebanon are encouraging and reinforcing this is still to be documented.

PURPOSE OF THE STUDY
More than one instrument has been found to measure faculty as well as elementary and K-12 teachers’ perception and embracement of diversity (Ng, Skorupski, Frey, & Wolf-Wendel, 2013; Pohan & Aguilar, 2001). However, since the relationship between violence, diversity, and education is found to
be positive (Salmi, 1993), the need for developing a valid and a reliable instrument to measure students’ attitudes towards diversity, violence and education becomes a necessity. Thus, in this study, the researcher developed a valid and reliable instrument to explore diversity in the perspectives of Lebanese and Syrian students in Lebanon. The instrument, “Students’ Attitudes towards Diversity and Violence and their perceived need for Education on Diversity Evaluation Form” (SADVEEF), assessed three factors: (a) students’ attitude towards diversity, (b) students’ attitude towards violence, (c) students’ perceived needs for education on diversity.

LITERATURE REVIEW

There is compelling evidence that diversity in schools is valuable for students (Astone & Nunez-Wormack, 1990; Duster, 1993; Gurin, 1999; Hurtado, Milem, Clayton-Pedersen, & Allen, 1999; Milem & Hakuta, 2000). Diversity creates a unique learning environment that leads to increased probability that students will (a) interact with peers from different background (Gurin, 1999) (2) improve intergroup relations and mutual understanding (Duster, 1993; Sleeter & Grant, 1994) (3) have greater relative gains in critical and active thinking (Gurin, 1999; Pascarella, Edison, Nora, Hagedorn, & Terenzini, 1996) (4) lead to more frequent participation in community service (Bowen & Bok, 1998; Gurin, 1999) and (5) show higher levels of civic engagement, cultural awareness, and commitment to improving racial understanding (Milem, 1994). Diversity thus has positive educational effects on student learning (Terenzini, Cabrera, Colbeck, Bjorklund, & Parente, 2001).

Although the above presented benefits are clear to researchers and some of the public, some families in Lebanon are refusing to send their children to schools where students are from different religions and backgrounds for safety reasons. Simultaneously, ethnic and religious grouping is happening as imposed by the nature of each city and village in Lebanon (Sakabedoyan-Keptiyan, 2014). In addition, Social cohesion and communal trust can erode in societies plagued by civil war (Colletta and Cullen, 2000). Voors et al. (2011) study of the behavioral changes in post-war Burundi provides evidence for increased altruism by both individuals and communities that experienced violence during the 1993-2005 civil conflict. Besides, Pinchotti and Verwimp (2007) local fieldwork in rural Rwanda exposes how social relations across ethnic groups are most likely to collapse in the presence of extreme violence, while social ties within the majority group can be strengthened for collective action against the minority group. Thus, if diversity is proven to have many educational and social benefits while war-related experiences are shown to sharpen one’s sense of group identity (Bauer, Cassar &Chytilova, 2011), an urgent educational intervention is thus needed. Therefore, the importance of issuing a reliable and valid instrument that would help researchers get a clearer view of how students’ perceive diversity and violence in order to decide on the educational actions to take is of great importance nowadays.

MEASURING DIVERSITY

Diversity is a wide umbrella that encompasses a multitude of individual differences and similarities that exist among people (Wellner, 2000). Gardenswaert and Rowe (1994) divided diversity into four dimensions: organizational, external, internal, and personality. The organizational dimension represents characteristics such as management status, union affiliation, work location, seniority, divisional department, work content/field, and functional level classification. The external dimension includes the individual’s personal habits, recreational habits, religion, educational background, work experience, appearance, status, marital status, geographic location, and income. In addition, the internal dimension of diversity comprises the human characteristics assigned at birth, such as age, race, ethnicity, gender, and physical ability, while personality is described as traits and stable characteristics of an individual that are viewed as determining particular consistencies in which that person behaves in any given situation and over time (Winstanley, 2006).

RESEARCH INSTRUMENT

In designing the instrument for this project, the researcher defined diversity as differences which encompass an individual’s race (country of origin), culture, gender, religion, and religious sect. Although this conceptualization is admittedly limited, the decision was guided by the fact that these characteristics are the mostly revealing ones in Middle Eastern societies as these particular societies are affected by the ISIS (Islamic State of Iraq and Al Sham) presence and acts. Terenzini et al. (2001) posited that researchers dealt with diversity based on different perspectives: the structural, the in situ, and the programmatic. Researchers who followed the structural way of dealing with diversity treated students of diverse racial, ethnic, and gender characteristics in a proportional or numerical manner. On the other hand, researchers examining in situ diversity relied on participants’ accounts of the frequency or nature of their interactions with the diverse others (e.g.Austin, 1993; Gurin, 1999). In this manner, i.e, in situ diversity, diversity is thought to be a normal occurring phenomenon that occurs in a defined setting. Lastly, studies of programmatic diversity searched the impact of curriculum, coursework, professional development, and other existing or
planned reforms to stimulate diversity (e.g. Terenzini et al. 2001).

**Relationship between Diversity, Violence, and Education**
The relationship between violence, diversity, and education is quite positive (Salmi, 1993). Education is an important instrument to overcome violence, improve respect for human rights, and live politically, socially, and culturally meaningful lives (Salmi, 1993). Further, diversity represents a challenge and an opportunity for education (Salmi, 1993). It is a challenge because policymakers and educators are called to respond to the claims of disadvantaged minorities and it is an opportunity because a society that learns to live with diversity is likely to achieve faster rates of economic growth and social development—if only by avoiding ethnic, religious, or sectarian conflict (Salmi, 1993; Smith, 2014; and Tawil & Harely, 2004).

Education can help shape a student’s fundamental attitudes and understanding of the causes of civil conflict including ethnicity, religion, entrenched poverty, social and political inequities, greed, and indignity (Greaney, 2006). In addition, formal education systems can aggravate civil unrest through curricula, textbooks, or teachers who portray minority groups or non-nationals in negative stereotypical terms (Bush and Saltarelli 2000). Thus, following wars and conflicts, policy makers should revise their approaches to education and revisit the concept of diversity to have effective outcomes reflected in curriculum development for a new era (Tawil, & Harely, 2004). The school curriculum, and the way it is taught, are expected to promote among young citizens both a sense of national solidarity and a well-informed, tolerant understanding of others (Greaney, 2006).

**METHOD**

**Instrument**
A pilot instrument consisting of 59 items was developed, printed, and handed to the participants. In this questionnaire, diversity was defined as “differences which encompass an individual’s race (country of origin), culture, gender, religion, and religious sect.” In choosing the domains and constructing the items for the instrument, the social, cultural, and religious background of the Middle Eastern society played a big role, taking into consideration the in situ contextual approach identified by Terenzini et al. (2001) to assessing diversity with an emphasis on climate. Thus, individuals were asked about their beliefs and attitudes towards individuals of different backgrounds, cultures, and religions. In addition, the individual’s attitudes towards violence were also addressed because of what these individuals are encountering in Lebanon and Syria whether at the refugee camps or in their micro societies. The third domain was the individuals’ perceived needs for education on diversity which encourages the educational institutions in Lebanon to address diversity and responsible citizenship issues in depth.

**SURVEY**
The instrument framework has three domains with 34 items. These domains included questions about general attitudes and beliefs about diversity (14 items); perceptions of violence (15 items), and the perceived need for educational change in schools (5 items). Using a Likert-type format, every item was scored from 5 — Strongly Disagree to 1 — Strongly Agree. A balance of items with positive and negative valences was included. Furthermore, the number of questions was highly affected by the limited safe time the researcher could spend with the individuals at the refugee camps collecting data. The instrument was translated from English into Arabic and then from Arabic into English for validation.

**SAMPLE**

**PROCEDURE AND SETTING**
This research took advantage of the “naturally formed” groups of students in the camps and in the school selected, and used a convenience sample. Creswell (2009) considered that, “In many experiments, only a convenience sample is possible because the investigator must use naturally formed groups (e.g. a classroom, an organization, a family unit) or volunteers” (p. 155).

First, consents were collected from the organization subcontracted by the United Nations and supervising the education in the camps and from the school principal. Consent forms guaranteed that neither the camps/school names, nor the students’ identities will be revealed or shared. Then, the researcher assistant collected data from Syrian Refugee students studying at two camps and from one school in the Bekaa Valley. The researcher assistant does some volunteer work at the camps so she handed the questionnaires to the students and told them that they are not assessed by any means and that there are no wrong answers or right ones and that they are free to leave the page blank and answer nothing. The researcher assistant waited till the students finished and collected the papers from each class. While students in the refugee camps are all Syrians, students in the school are mostly Lebanese.

The two camps selected have around 350 students. A definite number of students cannot be calculated as students in the camps keeps accelerating due to the ascending numbers of refugees entering Lebanon every day. The researcher assistant gave the questionnaire to the available number of students present the classes entered randomly at that time. The questionnaire was answered by 179 students and was returned to the research assistant present. Besides, the questionnaire was given to the grade six to nine students in the schools.
students at the school selected. 115 students out of 122 answered the questionnaire.

The researcher assistant gave the instrument to the school principal as she wasn’t granted consent to enter classes. The school principal handed the instrument to the classrooms’ teachers who gave the questionnaires to the students in the school selected.

Participants
The study sample included 294 individuals ranging from 12-17 years old. This sample size was somewhat less than ideal, but was larger than many recommended minima for conducting factor analysis suggested by researchers (Thompson, 2004). 167 of the participants are from 12-14 years of age while 127 are from 15-17 years of age. Approximately 47% of the participants were female, and 53% were male, 61% of the participants were Syrian Refugees and 39% were Lebanese students. The participants are of different backgrounds. Syrians are mostly from one religious sect and Lebanese are from a different religious sect than the Syrians, although they are all Muslims.

DATA ANALYSIS
Responses from the instrument were analyzed by means of an exploratory factor analysis (EFA) with Principal Components Analysis (PCA) extraction and varimax rotation. The researcher’s aim was to explore the data structure to determine an optimum factor structure, not test a prior hypothesis about dimensionality. PCA was used for the initial extraction for the EFA because of its utility in determining an optimal set of components by using eigen values and a scree test (Cattell, 1966). Varimax was employed to maintain orthogonality “orthogonal rotation methods assume that the factors in the analysis are uncorrelated” (Gorsuch, 1983, p.203). The criteria for decisions regarding the number of components in the final solution and item retention/deletion were as follows: using Cattell’s (1966) scree test, an optimal number of components was identified. Items were retained if they demonstrated strong (> |0.3|) loadings on one and only one component (e.g. Thompson, 2004). Any items with loadings less than |0.3| were deleted. Cross-loading items, those with loadings greater than |0.3| on multiple components, were also deleted. All items were then used to create reliable, independent scales to assess the attitudes towards diversity, violence, and the perceived need for education on these matters among students 12-17 years of age.

RESULTS
Preliminary Analyses
To determine the factorability of the inter-item correlation matrix, the researcher calculated Bartlett’s (1954) test of sphericity and the Kaiser-Meyer-Olkin (KMO) measure of sampling adequacy (as cited in Kaiser, 1974). Bartlett’s test of sphericity is a statistic that tests the null hypothesis that the population inter-item correlation matrix is an identity matrix. If a correlation matrix is not statistically different than an identity matrix, it indicates that the variables are not substantially interrelated. This null hypothesis was rejected (χ2 = 22108.204, df=1711, p < 0.0001). The KMO measures the extent to which the items measure a common component or components by determining their shared variance after accounting for their partial correlations. Results of this analysis indicated a high degree of shared variability (KMO = 0.927), indicating that a factor analysis would account for a very large portion of the overall variability in the data. Thus, an exploratory factor analysis was appropriate and would provide meaningful results.

Exploratory Factor Analysis
Results of the initial solution from the Principal Components Analysis indicated that three components would be appropriate for explaining the observed data. Based on this criterion, and the previously mentioned criteria of removing items with strong factor loadings on multiple dimensions, or without any strong factor loadings, a final set of 34 from the original 59 pilot items was retained. The 25 items that were removed had factor loadings more than 0.3 on more than one factor. The results of the scree test for the final set of 34 items indicated that these data could be efficiently summarized by three components. The three components were identified as (a) attitude towards diversity, (b) attitudes towards violence (resulting from rejecting the significant other), (c) the perceived need for education on diversity to enhance diversity and cultural awareness. Tables 1–3 display factor loadings, communalities after rotation, and descriptive statistics for every item on the attitude towards diversity, violence, and need for diverse education. Descriptive statistics for each of the three scales, mean across scale items, and standard deviation are displayed in Table 4. Table 5 presents a pattern of moderate correlations among the three scales. After the researcher reviewed the resulting components, the instrument (SADVEEF) was identified.
Table 1. Factor Loadings, Communalities, and Descriptive Statistics for Items on the Attitude towards Diversity Scale

<table>
<thead>
<tr>
<th>R.S. Factor Loadings</th>
<th>Descriptive Statistics</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Students from other religions are not as honest as students of my own religion.</td>
<td>.859</td>
</tr>
<tr>
<td>I generally find it stimulating to spend time talking with people from another culture, religion and sect.</td>
<td>X</td>
</tr>
<tr>
<td>It’s not good to talk to people from different backgrounds and cultural beliefs.</td>
<td>.855</td>
</tr>
<tr>
<td>Boys should always be given priority over girls.</td>
<td>.833</td>
</tr>
<tr>
<td>Talking to students from other religions makes me feel uncomfortable.</td>
<td>.823</td>
</tr>
<tr>
<td>People who have different beliefs than I do are usually wrong and must be corrected.</td>
<td>.804</td>
</tr>
<tr>
<td>It’s not acceptable to have girls and boys study in the same class. Girls who accept this should be punished.</td>
<td>.787</td>
</tr>
<tr>
<td>Talking to people from different genders makes me feel better.</td>
<td>X</td>
</tr>
<tr>
<td>Students from other races make a good contribution to our school.</td>
<td>X</td>
</tr>
<tr>
<td>I am uncomfortable around students whose religious background is different from my own.</td>
<td>.726</td>
</tr>
<tr>
<td>I like to live in a place where the people are of the same backgrounds, culture, religion and sect.</td>
<td>.707</td>
</tr>
<tr>
<td>Minority individuals should adopt the values and lifestyles of the dominant culture.</td>
<td>.690</td>
</tr>
<tr>
<td>I have very little in common with people from other religions.</td>
<td>.672</td>
</tr>
<tr>
<td>I think of myself, not only as a citizen of my country, but also as a citizen of the world.</td>
<td>X</td>
</tr>
</tbody>
</table>

Note. R.S. = Items marked with an “X” were reverse-scored before scale scores were calculated. Com. = Communality.

Table 2. Factor Loadings, Communalities, and Descriptive Statistics for Items on the Violence Scale

<table>
<thead>
<tr>
<th>R.S. Factor Loadings</th>
<th>Descriptive Statistics</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Some people deserve to be slapped to have them have the right beliefs.</td>
<td>.815</td>
</tr>
<tr>
<td>It’s very bad to insult people.</td>
<td>X</td>
</tr>
<tr>
<td>I don’t hit even when I am so angry.</td>
<td>X</td>
</tr>
<tr>
<td>It is possible to be angry or even argue with someone without being abusive.</td>
<td>X</td>
</tr>
<tr>
<td>There are always reasons for us to yell and scream.</td>
<td>.792</td>
</tr>
<tr>
<td>It is O.K. to slap people if they deserve it.</td>
<td>.110</td>
</tr>
<tr>
<td>I have to convert people to my religion even if by force.</td>
<td>.115</td>
</tr>
<tr>
<td>Peace doesn’t exist in this world at all.</td>
<td>.167</td>
</tr>
<tr>
<td>Slamming a locker door or driving recklessly in a car to scare someone is abusive.</td>
<td>.783</td>
</tr>
<tr>
<td>It’s O.K. to hit someone when you are so angry with them.</td>
<td>X</td>
</tr>
<tr>
<td>Some people are always wrong and should be beaten to think appropriately.</td>
<td>.130</td>
</tr>
<tr>
<td>Violence can be excused if afterwards, the violent person genuinely regrets what they have done.</td>
<td>.729</td>
</tr>
<tr>
<td>Threatening people is OK if you have your reasons.</td>
<td>.159</td>
</tr>
<tr>
<td>It is O.K. for guys to bad mouth their friends while it’s not OK for girls to do so.</td>
<td>.281</td>
</tr>
<tr>
<td>It is understandable when a guy gets too angry that he yells a lot.</td>
<td>.682</td>
</tr>
</tbody>
</table>

Note. R.S. = Items marked with an “X” were reverse-scored before scale scores were calculated. Com. = Communality.

Table 3. Factor Loadings, Communalities, and Descriptive Statistics for Items on the Perceived Need for Education for Diversity Scale

<table>
<thead>
<tr>
<th>R.S. Factor Loadings</th>
<th>Descriptive Statistics</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>I need to study in school how to understand and show respect for other people’s thoughts and beliefs without having to change mine.</td>
<td>X</td>
</tr>
<tr>
<td>I wonder if what I know about other cultures is correct and would love to learn more to be able to decide.</td>
<td>X</td>
</tr>
<tr>
<td>I like to spend more time at school in learning about people’s differences and the correct ways to deal with them.</td>
<td>X</td>
</tr>
<tr>
<td>I would love to study in my school about my rights and responsibilities as a human and a citizen.</td>
<td>X</td>
</tr>
<tr>
<td>I want to know what’s important in dealing with people from other countries, religions, and backgrounds.</td>
<td>X</td>
</tr>
</tbody>
</table>

Note. R.S. = Items marked with an “X” were reverse-scored before scale scores were calculated. Com. = Communality.
Construct Validity Analysis
Surveys are appropriate for research questions about self-reported beliefs or behaviors (Neuman, 2003). When working with multiple constructs in a survey study, it is important to satisfy convergent and discriminant validities in order to satisfy construct validity. When both convergent and discriminant validities are satisfied, construct validity is said to be satisfied. However, neither one alone is sufficient for establishing construct validity (Trochim, 2006). Convergent and discriminant validity tests were conducted using the correlational matrix approach. Convergent validity is a way to assess the construct validity of a measurement procedure (Campbell & Fiske, 1959). Discriminant validity measures whether a construct is truly distinct from another construct while convergent validity tests whether the scale items converge to measure a construct.

After conducting factor analysis with Promax rotation for the final scale set, the smallest within-factor correlations for Attitudes towards diversity r(294)=.445, p<0.0001, attitudes towards violence r(294)=.442, p<0.0001, and Perceived Need for education on Diversity (294)=.586, p<0.0001. These correlations are significantly different than zero which results in convergent validity of the instrument. Therefore, convergent validity was established by the moderate positive correlation of attitudes towards violence, attitudes towards diversity, and the perceived need for education on diversity.

Discriminant validity for each item is tested by counting the number of times that the item correlates higher with other factors than with items of its own theoretical factor. It was thus conducted through calculating the variance extracted between component 1, 2, and 3 ($\sigma^2=0.67$). The correlation square between 1 & 2: r (294) = 0.108; correlation square between 1 & 3: r(294)= 0.151, and correlation square between 2 and 3;r(294)=0.170. Discriminant validity obtained as the variance extracted is greater than correlation square.

A Shapiro-Wilk’s test (p<.01)(Shapiro & Wilk, 1965; Razalli & Wah, 2011) and visual inspection of their histograms, Q-Q plots and box plots showed that the attitudes towards diversity scores, attitudes towards violence, and perceived need for education on diversity were not approximately normally distributed for both the samples (females and males). A skewness of -.955 (SE=.194) and a Kurtosis of -.328 (SE=.386) for the females and a skewness of -.324 (SE=.206) and a Kurtosis of -.451 (SE=.410) for the males was revealed on attitudes towards diversity. A skewness of -.729 (SE=.194) and a Kurtosis of -.550 (SE=.386) for the females and a skewness of -.560 (SE=.206) and a Kurtosis of -1.109 (SE=.410) for the males was revealed on attitudes towards violence. A skewness of -1.467 (SE=.194) and a Kurtosis of 1.329 (SE=.386) for the females and a skewness of -.363 (SE=.206) and a Kurtosis of -1.217 (SE=.410) for the males was revealed on perceived need for education on diversity scores. A non-parametric Levene’s Test was used to verify the equality of variances across the samples (homogeneity of variance) (p>.05) (Nordostokke & Zumbo, 2010; Nordostokke, Zumbo, & Saklofske, 2011).

In addition, A Shapiro-Wilk’s test (p<.01)(Shapiro & Wilk, 1965; Razalli & Wah, 2011) and visual inspection of their histograms, Q-Q plots and box plots showed that the attitudes towards diversity scores, attitudes towards violence, and perceived need for education on diversity were not approximately normally distributed for both the samples (age 12-14/ 15-17). A skewness of -.963 (SE=.188) and a Kurtosis of .829 (SE=.374) for the 12-14 years old participants and a skewness of -.332(SE=.215) and a Kurtosis of -.780 (SE=.427) for the age of 15-17 years was revealed on attitudes towards diversity. A skewness of -.907 (SE=.188) and a Kurtosis of .138 (SE=.374) for the 12-14 years of age and a skewness of -.409 (SE=.215) and a Kurtosis of -1.293 (SE=.427) for the 15-17 years of age was revealed on attitudes towards violence. A skewness of -.342 (SE=.188) and a Kurtosis of -1.326 (SE=.374) for the 12-14 years of age and a skewness of -.1692 (SE=.215) and a Kurtosis of 3.142 (SE=.427) for the 15-17 years of age was revealed on perceived need for education on diversity scores. A non-parametric Levene’s Test was used to verify the equality of variances across the samples (homogeneity of variance) (p>.05) for attitudes on diversity (Nordostokke &Zumbo, 2010; Nordostokke, Zumbo, Cairns& Saklofske, 2011). P-value is <.05 for age (12-14 years/ 15-17years) on attitudes towards violence and perceived need for education, thus we reject the null hypothesis and assume the differences in variance or spread between the groups are statistically significant.

Table 4. Correlations among Scales (N=178)

<table>
<thead>
<tr>
<th>Component</th>
<th>Attitudes towards Diversity</th>
<th>Attitudes towards Violence</th>
<th>Perceived Need for education on Diversity</th>
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</thead>
<tbody>
<tr>
<td>Attitudes towards Diversity</td>
<td>1.000</td>
<td>.376</td>
<td>.432</td>
</tr>
<tr>
<td>Attitudes towards Violence</td>
<td>.376</td>
<td>1.000</td>
<td>.316</td>
</tr>
<tr>
<td>Perceived Need for education on Diversity</td>
<td>.432</td>
<td>.316</td>
<td>1.000</td>
</tr>
</tbody>
</table>

P<0.001
Besides, a non-parametric Levene’s Test was used to verify the equality of variances across the samples (homogeneity of variance) \((p>0.05)\) for perceived need for education on diversity (Nordostokke & Zumbo, 2010; Nordostokke, Zambo, Cairns & Saklofske, 2011). P-value is <0.05 for (Syrian verses Lebanese) on attitudes towards violence and attitudes towards diversity, thus we reject the null hypothesis and assume the differences in variance or spread between the groups are statistically significant (see table 5).

<table>
<thead>
<tr>
<th>Group Comparisons by Demographic Variables</th>
<th>Perceived need for education on diversity</th>
</tr>
</thead>
<tbody>
<tr>
<td>N</td>
<td>Violence</td>
</tr>
<tr>
<td><strong>Students</strong></td>
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* \(p>0.05\), ** \(p<.05\)

A number of readily-interpretable findings resulted from these analyses. Female participants have slightly higher scores on attitudes towards diversity, attitudes towards violence, and they show a greater perceived need for education than males do; however, the difference didn’t appear to be significant (see table 5). Besides, participants whose age ranges from 12-14 are statistically different from those 15-17 regarding attitudes towards violence and perceived need for education on diversity. Participants who are 12-14 show higher scores on attitudes towards violence while they don’t reveal a perceived need for education on diversity like participants who are 15-17 years old. In addition, participant who are from Syria and who are mainly in the refugee camps in Lebanon differed significantly from Lebanese students who are attending regular school in Lebanon whether on their attitudes towards diversity or their attitudes towards violence. Lebanese students who are studying in their hometown scored higher on attitudes pertaining to diversity, violence, and the need for education on diversity.

**DISCUSSION**

The central objective of this study was to create a valid and reliable instrument with which to assess students’ attitudes towards diversity, violence, and perceived need for education on diversity in Lebanon and Syria. In the process of development, the researcher found no research instrument that tackles these three scales together. Most existing instruments focus on institutional diversity (e.g. Ng et al., 2013; Shenkle, Snyder, & Bauer, 1998; Smith, 2009) rather than younger students’ attitudes towards diversity. Besides, tools such as the Diversity Assessment Questionnaire (DAQ), a civil rights project at Harvard University, which tests several different dimensions of experiences and attitudes regarding diversity (Kurlaender & Yun, 2001) does not look at attitudes towards violence and the students’ perceived need for school education on diversity.

In addition, and since historical religious traditions have left an enduring imprint on contemporary values (Inglehart, 2003), the research tools created should fit the Middle Eastern context taking into consideration the larger number of Muslim population and the increasing occurrences of wars and violence. There are tools that measure the emotional and behavioral consequences of a child’s exposure to adult domestic violence (e.g. Graham-Bermann, 1996; Grych, Seid, & Fincham, 1992) but they do not give information about the attitudes of youth towards violence.

By including the above-mentioned components, the present instrument allows researchers to look not only at broad aspects of students’ attitudes towards diversity but also at whether they support the idea of having further education on diversity. It also gives the researcher an idea of where the students stand regarding violence especially when most if not all are witnessing violent battles and the destruction of property of cultural and religious significance to them; this is an indicator for an increased risk of genocide, ethnic cleansing and crimes against humanity when combined with other risk factors (Dieng, 2014).

Results also suggest that students’ demographics are also important to consider when assessing diversity, attitudes towards violence and perceived need for education on diversity. It is important not to conceive the students’ body as one monolithic group. For example, we found that females, Lebanese students who are studying in their hometown and students who are 12-14 years of age were more likely to have positive attitudes about diversity, resent violence and violent actions than male, 15-17 years old, and Syrian participants.
These findings are consistent with other studies (Kalyvas, 2003; Wood, 2008) who found out that civil conflict has the potential to cement ethnic identities and increase local cleavages. Thus Syrian refugees’ moderate tolerance to diversity and their blur image of violence is greatly affected by the war they are living. At the individual level, violent conflict has proven to lead to posttraumatic stress disorder, psychological traumas, and elevated anxiety (Attanayake et al., 2009; Macksoud and Aber, 1996) but the effect of violent conflict on individuals’ disposition to diversity and violence is poor and thus still to be investigated.

LIMITATIONS
This study is based upon data gathered from Bekaa valley in Lebanon. Administering the (SADVEEF) to a wider array of students would help determine if variables such as geographic region, religious sect and social quo lead to different results. Also unknown is the generalizability of the psychometric characteristics of the instrument for other populations.

The other limitation is the number of questions asked. The main reason for a short number of questions is the political state in Lebanon especially in the refugee camps. The one collecting data cannot stay for a long time at any of the refugee camps.

A third study limitation is the validity and reliability of the instrument. While the evidence collected is supportive of validity and reliability, there exists a broad range of strategies for estimating the reliability of a measure and for developing a validity argument.

A fourth limitation of this study is the narrow definition of diversity and the focus on religion in particular.

CONCLUSION
Although critics of affirmative action argue that diversity provides no significant educational benefits and therefore is not a legitimate goal of education (e.g. Chang, 1999), it is time to have a united plan to face cultural and minority cleansing in the Middle East. Thus, it is not enough to call “cultural institutions, customs and practices” to debate the paradigm of Responsibility to Protect (R2P) (Bhabha, 2014). It is time for educational reform in the Middle East, if not to say in the world, which takes the acceptance of the significant other and education against violence as a forefront objective to start working on. One main benefit this tool can offer is that it would show what the students in Lebanon are thinking.

There is no benefit of education if the students do not show respect to significant others. This instrument can help researchers know where students stand and help predict the level of cultural awareness the future generation in Bekaa seeks. It is important to know that students who are taught chemistry in the labs will not end up manufacturing bombs because they were raised during times where cultural cleansing became a religious demand. It is the role of education to open the eyes of youth in the Middle East to other safe ways of living especially if they show that they need it and want it. Besides, results of the (SADVEEF) will be revealed in details showing the perceived needs of the students to education about diversity in the coming article.

While Lebanese people, like German, Swedish, Danish, French and Spanish, fear the Syrian refugees who are mostly Sunni and who might hold extremist ideologies (Hitchens, 2015), it is the role of education to change the way the refugees think. (SADVEEF) provides governments with a baseline which helps them build their educational action plans to further meet the needs of refugees. This instrument does the attention of policy makers that there is an urgent need to mold the curriculum to help cure and deal with the insecurities of refugee students and students living sectarian wars. It is not enough to accept refugees in one’s own country and provide them with shelters, food and regular education. Some students have witnessed sectarian cleansing, experienced the brutality of ISIS, and watched their own friends, relatives, and parents die before their own eye. It is this instrument which revealed that most students escaping war in Syria and Lebanon are blaming it all on diversity, and are learning subconsciously that religion should rule and are mostly convinced that life is for the fittest. It is through using (SADVEEF) that we get to know how students think and thus act accordingly.

REFERENCES


