

**This article entitled: "Measuring and Analyzing Students' Personal Characters in Implementing Character Education"**

**Authors:** [Fahmy, Rahmi](#); [Bachtiar, Nasri](#); [Rahim, Rida](#)

**Published in:** [Advanced Science Letters](#), Volume 23, Number 9, September 2017, pp. 8917-8923(7)

**Publisher:** [American Scientific Publishers](#)

**DOI:** <https://doi.org/10.1166/asl.2017.9995>

## **Measuring and Analyzing Students' Personal Characters in Implementing Character Education**

RahmiFahmy, NasriBachtiar, Rida Rahim  
*Faculty of Economics, Andalas University, Indonesia*

The purposes of this study are to re-identify the relevant measurement for student's personal characters in implementing character education for high school and apply this measurement to analyze the effect of those characters to student academic achievement. By using factor analysis, the research findings show that they are 8 dimensions of personal characters with 34 items are considered as relevant instruments for assessing personal characters building in education specifically in high school. Evidence of the scale's reliability, factor structure, and validity on the basis of analyzing data from 9 samples of high schools with 450 respondents are presented. Finally, paper presents the influence of personal characters to academic achievement. The analysis shows that 2 from 8 dimensions of personal characters have significant influence to academic achievement. They are D2 Peacefulness, and D4 Tolerance.

**Keywords:** student personal character, character education, academic achievement

### **1. Introduction**

Character education has gotten special attention in Indonesian. According to the Law No. 20 Year 2003 in National Education System (Sistem Pendidikan Nasional) states that "Education is a conscious and deliberate effort to create an atmosphere of learning where the learners are actively develop their potentials to have spiritual strength of religious, self-control, personality, intelligence, noble character, and the skills needed for themselves, society, nation and the State" (Depdiknas, 2003). By this definition, it is clear that education has strong purpose in building characters of learners. The implementation of character education in schools is listed explicitly in the National Long-Term Development Plan (Rencana Pembangunan Jangka Panjang/RPJPN) on 2005-2025, in which the government makes character development as one of the priorities of national development programs through Minister of National Culture and Education (Kemendikbud). In May 2nd, 2010, Minister of National Education (now Minister of National Culture and Education) through The Curriculum Development Centre Unit stated that in order to strengthen the implementation of character education in Indonesian, the unit had identified 18 values derived from religion, Pancasila (national ideology), culture, and national education goals (Kemendiknas, 2010).

In the year 2013 the Indonesian government mandated basic and mid schools to implement new curriculum named as '2013 Curriculum'. This new curriculum emphasized the need to build personal characters, particularly for the younger generation by integrating character education to the developing of knowledge, attitude and skill of students and balancing the hard skills and soft skills competencies in school educational teaching and learning. The implementation of 2013 Curriculum is expected to accomplish the aims of National Education which are to build human characters. After almost for three years of implementation, there is still a limited evaluation program effectiveness.

Some selected schools have implemented character education programs but there is no valid instrument to measure the impact of the programs on students' personal characters and the impact of these characters to students' academic achievement. In order to overcome these limitations, firstly in this article we review some related studies in character education, secondly we develop the instrument for measuring student's personal characters and analyze those personal characters to student's academic achievement and finally we present some discussions and conclusions.

## **2. Theoretical Framework**

### *Character*

Character is a consistent and predictable shown by the tendency of behavior. The behavior integrated with the attitudes and values (Lapsley & Narvaez, 2006). Character development starts from the formation of attitudes based on certain values, such as religious values, culture, including the state ideology. Experts give various definition about character such as Hunter (2000) defines character as the amalgamation of three elements: moral discipline, moral attachment, and moral autonomy. He proposes that character is constructed with those moral elements and is influenced not only by the individual differences in knowing and understanding of moral norms but also with different social and cultural factors that determine individuals moral behavior(Hunter, 2000). In a broader context as mentioned by Josephson (2013) character is not born of noble rhetoric or mere good intentions, but the character is born of honesty and loyalty attached to moral values(Josephson, 2013). Nucci (2001), states that a person of 'good' character is usually acquainted of the moral implications of their actions and act in accordance with what is moral(Nucci, 2001). Morality requires that one act in ways that are consistent with his moral judgment, and this in turn requires that moral understanding be translated into a sense of personal responsibility and action. In line to this direction Berkowitz & Bier (2004) defined character as a complex set of psychological characteristics, formed in part by growth in cognition that enables a person to act as a moral agent(Berkowitz & Bier, 2004). These arguments are also supported by Lickona (1991) and Park (2004) defined character in comprehensive mode to include thinking, feeling, and behavior, and character strengths should be accepted as a family of positive traits reflected in those thoughts, feelings, and behaviors Therefore, in every context, a person's character will be recorded and assessed by the environment (Gene, 2007).

### *Character Education*

In general character education movement emphasized the cognitive, affective, and behavioral aspects of character development while encouraging students to know the good, love the good, and do the good (Ryan & Bohlin, 1999). A review of the literature reveals a concern in finding the most efficacious approach to developing a student's character. Studies in character education have been conducted in the areas of cognitive development(Rest, Narvaez, Bebeau, & Thomas, 1999); virtues of character and social learning. Therefore, pedagogically, character education should be developed by applying a holistic approach. Berkowitz (2011) suggests that the effective character education is not adding a program or set of programs(Berkowitz, 2011). Rather it is a transformation of the culture and life of the school. The need to have a proper approach in character education seems more urgent, as stated by Lickona (2012) that 'The emerging adult lifestyle does not appear to be preparing youth for moral integrity in a challenging world, success in marriage, responsibility and sacrifice, or democratic citizenship'(Lickona,

2012). In UK for example, character education is currently high on political and educational agendas (Biesta, 2010). In some academic and political circles, 'character' has recently come to be equated only with the possession of performance virtues, such as resilience and self-confidence (Though, 2013). Despite of the various argumentations to the development of character education, the study about character education remain update by it own.

### *Student's Personal Character and Academic Achievement*

DeRoche and Williams (2001) argue that two main purposes for educating children and youth are cognitive development related to their academic achievement and character formation, which includes personal values and civic competencies (DeRoche & Williams, 2001). Understanding the factors that affect academic achievement has always been a major concern for counseling and educational psychologists. Many researchers are concerned to know in advance who will do well or not in academic activity. Consequently, identifying the determining factors of academic success is a major concern of the researchers to develop educational curriculum in order to improve the level of academic performance. This call for analyzing the reasons for individual differences in student academic achievement

Many researchers agree that both cognitive and personality variables should be taken into consideration when predicting academic performance (Rindermann & Neubauer, 2001), and neither of them is sufficient on its own. Although the direct relationship between academic performance and personality characteristics has been extensively studied (Chamorro & Furnham, 2005), the results were not as straight forward as they were for the relationship between intelligence and academic performance. Research works have identified intelligence as one major determinants of academic performance (Harris, 1940); (Elshout & Veenman, 1992); (Ackerman & Heggestad, 1997); (Stenberg & Kaufman, 1998). However, some schools of thought believe that cognitive ability factors alone cannot account fully for individual differences in academic performance (Rothstein, Paunonen, Rush, & King, 1994); (Rindermann & Neubauer, 2001); (Chamorro & Furnham, 2005); (Chamorro & Furnham, 2006). Therefore, some researchers have been explored the relationship between personality and academic performance (Chamorro & Furnham, 2006); (Nofle & Robins, 2007); (O'Connor & Paunonen, 2007); (Akomolafe, 2012) and the studies still showed various results.

### *Conceptualization of Personal Characters*

Character Education - refers to the curriculum title that educates students about such as caring, citizenship, fairness, respect, responsibility, and trustworthiness. Curriculum Centre Ministry of Education (2010) of Indonesia states that in order to further strengthen the implementation of character education in Indonesian educational institutions, has identified 18 values, namely: (1) Religiosity, (2) Honest, (3) Tolerance, (4) Discipline, (5) Work hard, (6) Creative (7) Independent, (8) Democratic, (9) Curiosity, (10) The Spirit of Nationality, (11) Love the country, (12) Rewarding Achievement, (13) Friendly / Communicative, (14) Love of Peace, (15) Joy of Reading, (16) Environmental Care, (17) Social Care, (18) Responsibility (Kemendiknas, 2010).

The detail of the implementation and the stipulated values are described and listed in the Handbook for the character of education (2010) published by Ministry of Education. The values offered by the government are rooted from Indonesian cultural values, religions and universal values (derived from religion, Pancasila (national ideology), culture, and national education goals). Values rooted from nation's cultural heritage and

religion include polite, patriotism, friendly, and being religious, while the ones rooted from universal values include respect, hardworking and democratic. The variety of sources indicates Indonesian government ambition to cultivate the national values through its education while to also introduce universal values. Hence, the education is expected to enable students to be more confidence with their identity as Indonesian while being able to adapt in the global society.

### **3. Method and Findings**

In this research we adopt 18 dimensions of student's personal characters that had developed by Pusat Kurikulum Depdiknas Indonesia (Curriculum Centre of Indonesian Ministry of Education) 2011. In the previous research we had developed the instrument (Fahmy, Bachtiar, Rahim, & Malik, 2015) we found that there were 6 dimensions to measure student's personal character which consisted of 22 items with 6 dimensions but the samples were limited only 91 respondents therefore the findings were not representative enough. In order to conduct a reliable factor analysis the sample size needs to be big enough (Costello & Osborne, 2005); (Field, 2009); (Tabachnick & Fidell, 2001). The smaller the sample, the bigger the chance that the correlation coefficients between items differ from the correlation coefficients between items in other samples (Field, 2009). Therefore, we conducted this study.

Now, in order to improve the accuracy of instrument we elaborate the items become 40-items. Those a 40-items instrument is designed to measure the students' perception to their personal character by using six-point scale range from Very Rare (1) to Always (6). Student's GPA is used as a measurement for academic achievement. Respondents for this research were students of 9 high schools in West Sumatra, Indonesia. All of those high schools have been implementing the 2013 curriculum for 2 years. Samples were taken from 2nd and 3rd year of studying; we excluded the 1st year since they didn't have GPA yet when we conducted this research. The samples size we improved by distributing the questionnaires to 450 students consist of 229 females and 221 males. They came from 9 different high schools from different regions where all of them come from public schools.

#### ***Exploratory Factor Analysis***

We applied Exploratory Factor Analysis (EFA) technique by using SPSS. EFA was used because researcher wanted to discover the number of factors influencing variables and to analyze which variables 'go together' (DeCoster, 1998). The process of data analysis was as followed, firstly we examined the factor matrix of loading and identify significant loading. According to Hair et al. (2010) If sample size more than 200, factor loadings of 0.40 and higher will be considered significant for interpretative purposes (Hair, William, Barry, & E.R. Anderson, 2010). By using extraction method-principal axis factoring and rotation method Varimax Kaiser Normalization we found at first rotated there were the 37-items with significant loading factors more than .40 and clustered to 9 factors (dimensions) and 3-items were deleted. The deletion of certain items and the resultant reduction in the total number of factors or cluster of items and the reassignment of certain others necessitated the reexamination of the factor structure of the reduced item pool. This iterative sequence of analyses were repeated up to four times and resulted in a final pool of 34-items, 6 items deleted and representing 8 distinct factors as presented in Table 1.

	Factor							
	1	2	3	4	5	6	7	8
In everyday life both at home and at school yuo .....								
<i>D8. Dicipline</i>								
(Q1) ..... obey in carrying out the teachings of the religion professed	,221	,084	,121	,321	,086	-,017	,208	,498
(Q12) ... in order on the various rules and regulations	,070	,065	,180	,026	,080	,220	,184	,795
(Q13) ... comply with the various rules and regulations	,114	,068	,212	,046	,119	,130	,124	,838
<i>D7. Honesty</i>								
(Q4) .... make yourself as someone who can be trusted in every word	,149	,107	,032	,212	,175	,145	,815	,083
(Q5) .... make yourself as a trustworthy person in every deed	,127	,143	,118	,179	,161	,133	,830	,155
(Q6) ... make yourself as someone who can be trusted to carry out any responsibilities given	,167	,182	,149	,277	,134	,035	,688	,291
<i>D6. Respect</i>								
(Q9) .... respect the opinions of others who are different from themselves	,099	,165	,171	,274	,116	,747	,075	,151
(Q10)....respect the choices of others who are different from themselves	,163	,162	,153	,194	,152	,818	,078	,114
(Q11) ...appreciate the actions of others who are different from themselves	,165	,130	,075	,101	,153	,782	,148	,122
<i>D5. Creative</i>								
(Q15) ...think of new ideas of something that already exists	,158	,148	,260	-,024	,613	,148	,246	,171
(Q16) ...take a new approach of something that already exists	,095	,267	,299	-,006	,535	,116	,243	,122
(Q17) ...not depend on others to complete tasks given	,164	,084	-,057	,101	,470	,083	-,027	,395
(Q20) ...attempt to find out more details of something that has been learned, seen, and heard	,276	,090	,073	,195	,746	,112	,117	,029
(Q21) ...endeavor to know more than anything has been learned, seen, and heard	,207	,063	,105	,181	,770	,120	,096	,013
<i>D4. Tolerance</i>								
(Q2) ... respect for others in performing their religious worship	,119	,146	,075	,743	,026	,002	,149	,276
(Q3) ....live in harmony with other faiths	,061	,009	,058	,730	,108	,084	,188	,019
(Q7).....appreciate the different religious teachings of self	,141	,077	,136	,651	,181	,263	,086	,043
(Q8) ....appreciate the tribe or ethnic others who are different from yourselves	,004	,193	,177	,679	,072	,321	,112	-,048
<i>D3. Patriotism</i>								
(Q22) .. feel proud of the achievements of the nation	-,008	,196	,683	,194	,041	,109	,053	,097
(Q23) .. aspire to boast the nation/Indonesia	,079	,233	,709	,229	,098	,022	,043	,167
(Q24)... learn about Indonesia eagerly	,242	,111	,635	-,043	,122	,175	,110	,182
(Q26).. give the best for the nation	,345	,101	,656	,044	,187	,105	,074	,081

*D2. Peacefulness*

(Q30)... try to make friends with many people	,125	,607	,355	,150	,162	,138	-,011	-,128
(Q31)... learn to understand others.	,148	,765	,119	,040	,185	,213	,135	,078
(Q32)... learn to respect others	,125	,772	,111	,141	,154	,185	,050	,152
(Q33)....try to resolve disputes with others	,268	,652	,077	,005	,087	,086	,204	,017
(Q34)...prioritizes peace of hostility	,227	,584	,315	,165	-,115	-,042	,090	,167

*D1. Responsibility*

(Q27)....try to produce something that is useful for many people	,492	,158	,387	,140	,233	,124	,106	-,010
(Q35) ...get used to provide the time to read various passages helpful	,605	,090	-,039	,089	,253	,131	,067	,225
(Q36) ...seek to prevent damage to the natural environment	,680	,161	,214	,167	,083	,078	,029	,186
(Q37) ...help improve the environmental damage that has occurred	,785	,090	,204	-,034	,073	,141	,091	,053
(Q38) ...want to give assistance to others in need	,581	,296	,135	,174	,233	-,046	,064	-,047
(Q39) ...carry out the duties and obligations for yourself	,415	,321	,101	,222	,108	-,020	,109	,159
(Q40) ...do tasks and take responsible for others	,537	,175	,003	-,066	,184	,227	,231	,044

Extraction Method: Principal Component Analysis.

Rotation Method: Varimax with Kaiser Normalization.

a. Rotation converged in 8 iterations

Note: *Scale range from Very Rare (1) to Always (6)*

*All items in questionnaire in Bahasa Indonesia*

Sources: Field Survey, 2016

**Table I: Student Personal Characters Dimensions Analysis after VarimaxRotation<sup>a</sup>**

In the final pool of analysis 3 dimensions stayed in the same category, they are D6. Tolerance; D7 Honest and D8 Dicipline, whereas the rest dimensions are clustered in the new categorize, they were D1 Rewarding Achievement, Joy of Reading, Concern to Environment and Responsibility; D2 Communicative and Love Peace; D3 Patriotism and Nationalism ; D4 Religious and Tolerance; and D5 Creative, Independent and Curiousity. In the new cluster we rename those dimensions, they are D1 Responsibility; D2. Peacefulness ; D3. Patriotism; D4. Tolerance; D5. Creative; D6. Respect; D7. Honesty; and D8. Dicipline

### *Regression Analysis*

In the next analysis, we operated the new instrument of 8 dimensions that consisted of 34-items of personal characters to measure the effect of student perceptions in personal character to academic achievement. Validity, Reliability were tested followed by Normality, Heteroskedastisitas, Multicollinearity testings before we conducted the regression analysis. For the purpose of analysis we used the SPSS.

Validity Test showed that all 34 items were valid which showed by *pearson correlation* value more than 0.5 ( $r > 0.5$ ). The result of Reliability test indicated that all independent variables or dimensions in this research were also reliable, it supported by all variables' coefficient of *cronbach's alpha*  $> 0.80$  which was considered highly reliable. Following by Normality test which also shown that all data both for independent and dependent variables were distributed normally which supported by the ratio of skewness and curtosis between -2 to +2, ratio skewness =  $(-0,183/0,115) = -1,591$  and ratio kurtosis =  $(-0,347/0,230) = -1,509$ . In this study the Multicorrineality among variables were not exist since the *tolerance values*  $> 0.1$  and *VIF values*  $< 10$ . Moreover, in this research the data didn't indicate the heteroschedasity, data were spread upper and below 0 on Y axist as showed by *scatterplot* diagram and they didn't have certain pattern.

Multiple regression in this research was applied by using the F Test, the result show that indipendent variables which were Responsible, Peaceful, Patriotism, Tolerance, Creative, Respect, Honesty and Dicipline as predictors could infuence simultaneously and significantly the independent variable which was academic achievement at *F Sig. Value*  $0.015 < 0.05$ . It meant the the model has predictive value. Model summary also showed that the value of *R Square* was 0.042, it meant that indipendent variables (variables of student's personal characters) could only explain the dependent variable (student's academic achievement) 4.2% the rest about 95.8% explain by other varibales which were not analyzed in this research. Although the value of influence of dependent variables to dependent variable was small but it influenced significantly.

Partial T Test was conducted by comparing the value of *t*counted to *t*tables. This test was done in order to measure the influence and the level of significant of each variables or dimensions of student's personal characters as independent variables to student's academic achievement as dependent variable. In this research the *t* counted value was bigger than *t* table value with *sig. value* < 0.10. The research finding showed that two independent variables significantly influenced the dependent variable (academic achievement). They were D2. Peacefulness and D4. Tolerance.

Surprisingly from Beta Coefficient we found that from 8 dimensions of student personal characters only 4 dimensions had positive correlations to student academic achievement. There were Tolerance, Creative, Respect and Honesty and the rest 4 dimensions had negative correlation there were Responsible, Peacefulness, Patriotism and Discipline. In the final pool of analysis 3 dimensions stayed in the same category, they are D6. Tolerance; D7 Honest and D8 Discipline, whereas the rest dimensions are clustered in the new categorize, they were D1 Rewarding Achievement, Joy of Reading, Concern to Environment and Responsibility; D2 Communicative and Love Peace; D3 Patriotism and Nationalism ; D4 Religious and Tolerance; and D5 Creative, Independent and Curiosity. In the new cluster we rename those dimensions, they are D1 Responsibility; D2. Peacefulness; D3. Patriotism; D4. Tolerance; D5. Creative; D6. Respect; D7. Honesty; and D8. Discipline

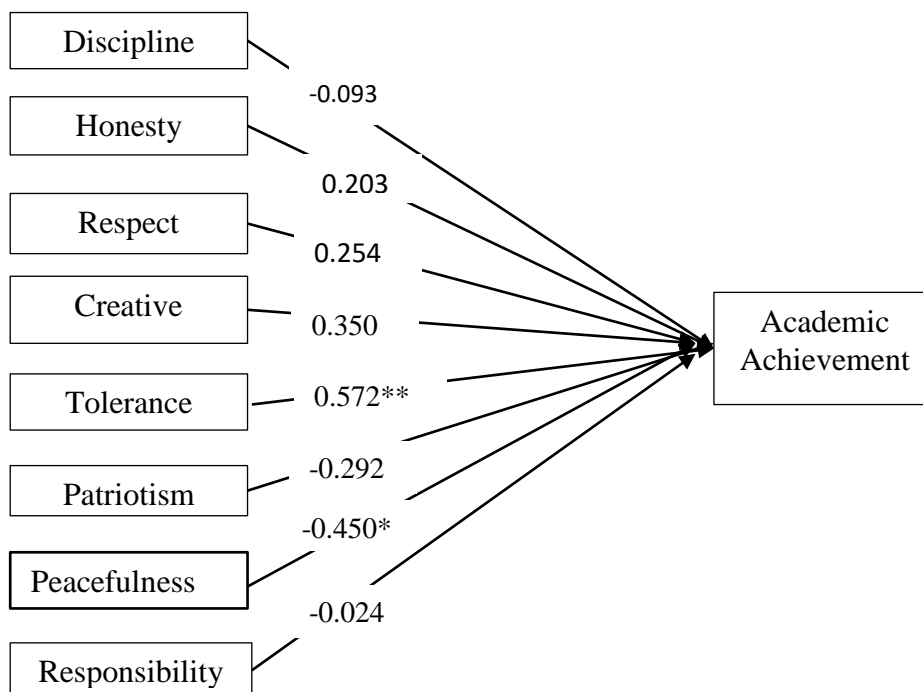
## Regression Analysis

In the next analysis, we operated the new instrument of 8 dimensions that consisted of 34-items of personal characters to measure the effect of student perceptions in personal character to academic achievement. Validity and Reliability were tested followed by Normality, Heteroskedasticity, Multicollinearity testing before we conducted the regression analysis. For the purpose of analysis we used the SPSS.

Validity Test showed that all 34 items were valid which showed by Pearson correlation value more than 0.5 ( $r > 0.5$ ). The result of Reliability test indicated that all independent variables or dimensions in this research were also reliable, it supported by all variables' coefficient of cronbach's alpha  $> 0.80$  which was considered highly reliable. Following by Normality test which also shown that all data both for independent and dependent variables were distributed normally which supported by the ratio of skewness and kurtosis between -2 to +2, ratio skewness =  $(-0.183/0.115) = -1.591$  and ratio kurtosis =  $(-0.347/0.230) = -1.509$ . In this study the Multicollinearity among variables were not exist since the tolerance values  $> 0.1$  and VIF values  $< 10$ . Moreover, in this research the data didn't indicate the heteroscedasticity, data were spread upper and below 0 on Y axis as showed by scatterplot diagram and they didn't have certain pattern.

Multiple regression in this research was applied by using the F Test, the result show that independent variables which were Responsible, Peaceful, Patriotism, Tolerance, Creative, Respect, Honesty and Discipline as predictors could influence simultaneously and significantly the independent variable which was academic achievement at F Sig. Value  $0.015 < 0.05$ . It meant the model has predictive value. Model summary also showed that the value of R Square was 0.042, it meant that independent variables (variables of student's personal characters) could only explain the dependent variable (student's academic achievement) 4.2% the rest about 95.8% explain by other variables which were not analyzed in this research. Although the value of influence of dependent variables to dependent variable was small but it influenced significantly.

Partial T Test was conducted by comparing the value of t counted to t tables. This test was done in order to measure the influence and the level of significant of each variable or dimensions of student's personal characters as independent variables to student's academic achievement as dependent variable. In this research the t counted value was bigger than t table value with sig. value  $< 0.10$ . The research finding showed that two independent variables significantly influenced the dependent variable (academic achievement). They were D2. Peacefulness and D4. Tolerance.



Note: \* = Significant level at 0.1; \*\* = Significant level at 0.05

**Figure 1: The Effect of Student Personal Characters to Academic Achievement**

Surprisingly from Beta Coefficient we found that from 8 dimensions of student personal characters only 4 dimensions had positive correlations to student academic achievement. There were Tolerance, Creative, Respect and Honesty and the rest 4 dimensions had negative correlation there were Responsible, Peacefulness, Patriotism and Discipline.

#### **4. Discussion and Conclusion**

As expected by Indonesian government that the implementation of new curriculum named as 2013 Curriculum which emphasizes the need for education in schools to develop human resources who are not only knowledgeable, skilled but also have strong character. For this purpose, several high schools have been chosen to implement this new curriculum as pilot schools. This study tried to develop an instrument to evaluate program of character education on student personal characters and its influence to student academic achievement.

This study resulted a final pool instrument of 34-items representing 8 distinct factors or dimensions to measure the perception of students toward their personal characters that were developed through the implementation of character education. They were Discipline, Honesty, Respect, Creative, Tolerance, Patriotism, Peacefulness, and Responsibility. In comparison to the eleven universal values that introduced by Lickona (1997), the findings of study show the eight of values in building personal characters as show by Table 2.

As stated by Williams (2000), in character education practice, the trend of study was have emphasizing more on similarities rather than differences; a balance of moral reasoning skills and establishing behavioral habits; a balance of focus on the responsibilities of the individual and the community; an inclusion of cognitive, affective, and behavioral dimensions; and an expectation for educators to serve as role models for students. In this study, we try to enrich the research in character education by developing the instrument measurement by re-identify the values of character education in Indonesian context for students personal characters, as shown by Table 4 above.

Values transmitted in Indonesia (Research Findings)	Universal Values (taken from Lickona 1997)
'Kejujuran' or Honesty	Honesty
'Disiplin' or Discipline	Respect
'Menghargai' or Respect	Tolerance
'Kreatif' or Creative	Prudence
'Toleransi' or Tolerance	Responsibility
'Semangat Kebangsaan' or Patriotism	Discipline
'Cinta Damai' or Peacefulness	Helpfulness
'Bertanggung Jawab' or Responsibility	Fairness
	Compassion
	Cooperative
	Courage

Source: findings based on field survey, 2016

**Table 2: Comparison Values for Building Personal Characters between Indonesian and Universal Values**

These 8 dimensions, then, were used as variables to measure the impact of student personal characters as independent variables to student academic achievement as dependent variable. In model summary showed that the value of *R Square* was 0.042. It means, independent variables (variables of student personal characters) could only explain the dependent variable (student academic achievement) about 4.2% and the rest of 95.8% explain by other variables which are not analyzed in this research. Although the value of influence of independent variables to dependent variable is small but it has significant value. We found 2 dimensions among 8 dimensions influence significantly the student academic achievement, they are Peacefulness and Tolerance, but they influence in different direction, variable Peacefulness negatively and significantly influence the academic achievement, meanwhile the Tolerance positively and significantly influence the academic achievement.

Samples of this study are come from higher ranking schools in West Sumatra. These schools have been selected by government to implement this new curriculum named as *Kurikulum* 13 caused they are considered ready to adopt the new program which is character education. Surprisingly, among 8 dimensions or variables of personal characters, 4 of them have negative correlation coefficient or negatively relate to academic achievement, there are Responsibility, Peaceful, Patriotism and Discipline.

There could be many possibilities to explain of these findings, but if we have a look from Indonesian context, Indonesian schools particularly in high schools, students spend too much time to study in school. Based on our surveys and in-depth interviews with students, parents and teachers that we had been conducted and will be presented in different paper, we found that most of students did not have enough time to have extra school activities. Even they were been asked by parents or schools to eliminate their activities out of schools in order to make them focused and spent more time in studying, especially when

they were at 3rd year, the last year of studying in high school before go to university. It is supported by the fact that our samples, all students want to go to the best Universities with a very competitive rate.

In indepth interview and survey we find that most of those students spend more and longer time to take extra courses or extra classes out of school studying hours. Teachers and parents have pushed their students/children to get higher grade or mark in order to be accepted in their favorite universities and the image of schools much related to it. In some ways, schools or teachers had neglected the meaning or the importance of students activities out of class to participate in social activities with communities. Students have difficulties to manage their time between studying at schools and having allocation time to spend with communities, families and friends to enjoy their life or having opportunities to a better achievement in exschool activities. The more their time spend for these kind of activities the less their time for studying. We unsure that schools or teachers take these related situation could deteriorate students' characters building as an important point to consider in students' academic achievement. Schools still see that 'academic achievement' is much related to knowledge and skills but less attention to build student personal character. Therefore, Responsibility, Patriotism and Discipline have negative influence to student academic achievement, particularly in the variable of Peacefulness.

On the other hand, Tolerance, Creative, Respect and Honesty, have positive correlation to student academic achievement. Based on our observation, the possibilities to explain this condition is Indonesian people particularly young people like students who study in the city have more exposure to the diversity. By the fact, Indonesia has higher diversity in many ways, such as in ethnicity, local languages, religions, place of origin from thousands of islands and Indonesian very well come to the new comers or visitors. They love to life in harmony. Culturally and religiously since in the young age, children have been thought to respect others by parents, schools and '*guru agama*' (spiritual teachers). In Indonesian we call the diversity as *Bhineka Tunggal Ika*, means though we are different but we are one. This condition is very much reasonable to support our finding that Tolerance influenced positively and significantly the academic achievement. Moreover, students as samples in this study, were studying in top high schools in the region, students came from various places. In these schools as education institution, students were encouraged to be creative and keep the integrity as the highest morality. The academic atmosphere seems more competitive, students are stimulated more creative and be fair and sportive in teaching and learning process. Good schools or top schools, they tend to keep the integrity or the honesty as the highest priority. Therefore, it could explain why variables such as Creative, Respect and Honesty, have positive correlation to student academic achievement

In conclusion, this study findings are in line with the previous studies. Many researchers agree that both cognitive and personality variables should be taken into consideration when predicting academic performance (Rindermann & Neubauer, 2001); (Chamorro & Furnham, 2005), however, neither of them is sufficient on its own. Although the direct relationship between academic performance and personality characteristics, in this study student personal characters, has been extensively studied (Chamorro & Furnham, 2005), the results were not as straight forward as they were for the relationship between intelligence and academic performance, as also showed by our study findings.

Finally, we hope this new instrument of student personal characters variables could be used by Indonesian Minister of Culture, Basic and Secondary Education to assess their student personal characters building in implementing character education. For the future research in order to get better results, we suggest to have bigger samples size to see more variance at different levels of education, such as for junior high schools and higher education or universities to analyze the focus and the dominant variables of personal characters development at each stage of level education. Since the character education is a long process started from basic up to higher education, therefore to see the result on how good those personal characters adopted in character education by learners we have to analyze further in what variables/dimension should be focused at each level of education.

## **Acknowledgments**

This research was funded by Indonesian Minister of Research, Technology and Higher Education under University Institutional Research Grant of Andalas University (LPPM UA). We would like to thank to all participants in this research: School Head Masters, Teachers, Students and representative from Dinas Pendidikan Menengah Sumatera Barat and to all dear colleagues and surveyors. Any opinions, findings, and conclusions or recommendations expressed in this paper are those of the authors.

## **References and Notes**

Ackerman, P. L., & Heggestad, E. D. (1997). Intelligence, Personality, and Interest Evidence for Overlapping Traits. *Psychological Bulletin*, 121, 219-245.

Akomolafe, J. M. (2012). Personality Characteristics as Predictors of Academic Performance of Secondary School Students. *Mediterranean Journal of Social Science*, 4(2), 657-664.

Berkowitz, M. W. (2011). What Works in Values Education. *International Journal of Educational Research*, 50(3), 153-158.

Berkowitz, M. W., & Bier, M. C. (2004). Research Based Character Education. *The Annals of The American Academy of Political and Social Science*, 591, 72-85.

Biesta, G. (2010). *Good Education in The Age of Measurement: Ethics, Politics, Democracy*. CO Boulder: Paradigm Publisher.

Chamorro, T. P., & Furnham, A. (2005). *Personality and Intellectual competence*. NJ. Mahwah: Lawrence Erlbaum Associates.

Chamorro, T. P., & Furnham, A. (2006). Intellectual Competence and The Intelligence Personality: A Third Way in Differential Psychology. *Review of General Psychology*, 10, 251-267.

Costello, A. B., & Osborne, J. W. (2005). Exploratory Factor Analysis: Four Recommendations For Getting The Most From Your Analysis. *Practical Assessment, Research, and Evaluation*, 10(7), 1-9.

DeCoster, J. (1998). Overview of Factor Analysis, from <http://www.stathelp.com/notes.html>

Depdiknas. (2003). *Sistim Pendidikan Nasional, Undang-Undang Republik Indonesia Nomor 20*.

DeRoche, E. F., & Williams, M. W. (2001). *Character Education: A Primer for Teacher*. Allen TX: Argus.

Elshout, J., & Veenman, M. (1992). Relation Between Intellectual Ability and Working Method as Predictors of Learning. *Journal of Educational Research*, 85, 134-143.

Fahmy, R., Bachtiar, N., Rahim, R., & Malik, M. (2015). Social and Behavioral Science. *Procedia, Elsevier*, 211, 851-858.

Field, A. (2009). *Discovery Statistic Using SPSS*: Sage Publication.

Gene, K. (2007). *Building Character*. San Fransisco: Jossey Bass.

Hair, J. F., William, B. C., Barry, B. J., & E.R.Anderson. (2010). *Multivariate Data Analysis: A Global Perspective*. New Jersey.

Harris, D. (1940). Factors Affecting College Grades: A Review of the Literature, 1930-1937. *Psycological Bulletin*, 37, 125-166.

Hunter, J. D. (2000). *The Death of caharacter: Moral Education in an age without good or evil*. New York.

Josephson, M. (2013). Josephson Institute of Ethics and Character Counts, from [www.josephsoninstitute.org](http://www.josephsoninstitute.org)

Kemendiknas. (2010). *Pengembangan Pendidikan Budaya dan Karakter Bangsa: Pedoman Sekolah*. Jakarta: Puskur Balitbang Kemendiknas.

Lapsley, D. K., & Narvaez, D. (2006). *Character Education* (Vol. 4). New York: Wiley.

Lickona, T. (2012). Academic Congress of Rethinking, from [http://ols.uas.mx/a/pdf-uams/Congreso-Academico/Ponencia\\_Thomas-Lickona.pdf](http://ols.uas.mx/a/pdf-uams/Congreso-Academico/Ponencia_Thomas-Lickona.pdf)

Noftle, E. E., & Robins, R. W. (2007). Personality Predictor of Academic Outcome: Big Five correlates of GPA and SAT scores.

Nucci, L. (2001). *Education in the Moral Domain*. New York: Cambridge University Press.

O'Connor, M. C., & Paunonen, S. V. (2007). Big Five Personality Predictors of Post-Secondary Academic Performance. *Personality and Individual Differences*, 43, 971-990.

Rest, J., Narvaez, D., Bebeau, M., & Thomas, S. J. (1999). *Postconventional Moral Thinking: A Neo-Kohlbergian Approach*. Mahwah NJ: Lawrence Erlbaum Associates.

Rindermann, H., & Neubauer, A. (2001). The Influence of Personality on Three Aspects of Cognitive Performance: Processing Speed, Intelligence and School Performance. *Personality and Individual Difference*, 30, 829-842.

Rothstein, M. G., Paunonen, S. V., Rush, J. C., & King, G. A. (1994). Personality and Cognitive Ability Predictors of Performance in Graduate Business School. *Journal of Educational Psychology*, 86, 516-530.

Ryan, K., & Bohlin, K. E. (1999). *Building Character in School: Practical Ways to Bring Moral Instruction to Life*. San Fransisco: Jossey- Bass Inc.

Stenberg, R., & Kaufman, J. (1998). Human Abilities. *Annual Review of Psychology*, 49, 479-502.

Tabachnick, B. G., & Fidell, L. S. (2001). *Using Multivariate Statistic*. Boston: Allyn & Bacon.

Though, P. (2013). *How Children Succeed: Grit, Curiosity, and the Hidden Power of Character*. London: Random House Book.