

**RELATIONSHIP BETWEEN MEDIATING EFFECT OF INTENTION
AND ATTITUDE TO ACADEMIC DISHONESTY AMONG
UNDERGRADUATE STUDENTS IN PUBLIC UNIVERSITIES IN
GHANA**

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Abstract

The study was designed to ascertain the relationship between mediating effect of intention and attitude toward academic dishonesty among undergraduate students in public universities in Ghana. Three null and alternative hypotheses guided the study. The study adopted correlational survey research design to randomly sample the views of 1,200 university undergraduate students using structured questionnaire. Pearson Correlation Coefficient and Structural Equation Modelling (SEM) were used for data analysis. The finding of the study showed that a weak negative relationship existed between attitude towards academic dishonesty and academic dishonest behaviours which implied that as students' attitude towards academic dishonesty increases, there is a small increase in their ability to indulge in academic dishonest behaviours. The finding also revealed that a weak positive relationship existed between intention towards academic dishonesty and academic dishonest behaviours which implied that as students' intention towards academic dishonesty increases, their academic dishonest behaviours increase. The finding showed that the mediating role of intention produced an indirect effect on attitude to academic dishonesty which was significant. In conclusion, the findings of the study showed that an increase in intention to commit academic dishonesty will lead to an increase in academic dishonest behaviours. Based on the findings, the study recommended that university authorities should enforce the rules and regulations against academic dishonesty fully without fear or favour. There should be no sacred cows; all offenders who might condone and connive with the menace should be severely punished.

Keywords: Intention, Attitude, Academic Dishonesty

Introduction

Educational institutions have important duties and responsibilities to help form an honest society and to raise individuals with ethical principles (Levy &

Rakovski, 2006). Yet, academic dishonesty is becoming more and more common at every stage of education (Broekelman-Post, 2008). Passow, Mayhew, Finelli, Harding and Carpenter (2006) posited that academic dishonesty undermines the credibility of learning. It also puts one's integrity at stake. Academic dishonesty negatively affects instructional measurement as well as learning (Brimble & Stevenson-Clarice, 2005), leading to the production of half-baked graduates (Harding, Carpenter, Finelli & Passow, 2004). Due to its prevalence among students, academic dishonesty is said to have reached epidemic levels in colleges in United States of America (USA) (McCabe, Trevino & Butterfield, 2006). Studies conducted among undergraduates in the USA, Korea, Ethiopia, Nigeria among others, found that undergraduates cheat occasionally (Wowra, 2007; Ledesma, 2011, Tadesse & Getachew, 2010). Also, a study conducted by Appiah (2016) revealed high prevalence of plagiarism and related academic dishonesty practices among undergraduate students in the public universities in the Kumasi metropolis of Ghana; and the root causes were enumerated as academic work load, limited time, inability to paraphrase original information, availability and accessibility of course materials from internet using various browser among others.

Academic dishonesty referred to academic misconduct or fraud or actions engaged by students and staff that violate the rules and regulations or norms a school and other educational institutions. Petress (2003) noted that there are many forms of academic dishonesty. These range from cheating or copying test answers from friends, taking an examination on behalf of friends (impersonation), failure to cite other people's work (plagiarism), taking examination questions home, faking research papers and pretending they are one's own work, breaking into the examination office or lecturers' files to access the tests or answer keys, sabotaging peers' work or gaining illegal access into school computers to change official grades, fabrication or falsification of data, citations or information in academic activities among others.. In a related development, Roberts (2002) alleges that plagiarism is another form of academic dishonesty whereby authors tend to manipulate the information in favour of what they want to gain. University of Berkeley Code of Student Conduct (2004) defines plagiarism as the use of intellectual material produced by another person without acknowledging its source in the submission of formal or informal academic assignments. According to the Code plagiarism includes, but is not limited to:

- a. Copying from the writings or works of others into one's academic assignment without proper attribution or submitting such work as if it were one's own;

- b. Paraphrasing the characteristic or original phraseology, metaphor, or other creative, artistic or literary device of another without proper attribution;
- c. Using the views or insights of another without proper attribution; or
- d. Copying, paraphrasing or otherwise using the research data, results, codes, formulae or algorithms of another without proper attribution.

To understand this behaviour (academic dishonesty), Ajzen (1991) in his theory of planned behaviour, opined that in order to predict and explain the behaviour of an individual, the person's intentions to perform or not to perform behaviour must be determined. Ajzen and Fishbein (1980) argued that intentions encompassed factors that suggested how committed a person was to performing a given behaviour. Based on this rationale, it is expected that the stronger a person's intentions, the more likely it is for that individual to perform a given behaviour. In this study, intention is used as a mediator variable.

Interestingly, Frazier, Tix, and Barron (2004) opined that a simple mediational model assumes an intermediary process that leads from the predictor variable to the criterion variable. In other words, in a simple mediational model, the predictor variable is presumed to cause the mediation, and in turn, the mediation causes the criterion variable. Collins, Graham and Flaherty (1998: 297), describe the mediation process as "a line of dominos knocking over the first domino that starts a sequence where the rest of the dominos are knocked over one another". In light of this fact, the measurement of behavioural intentions rather than actual behaviour seems to be more practical, especially given the strong relationship between intentions and the subsequent behaviour (Carpenter & Reimers 2005); although behavioural intentions have been proposed to be a function of attitudes. Ajzen and Fishbein (1980) highlighted the fact that the significance of these factors would fluctuate according to the type of behaviour and conditions under which the behaviour will be performed. Beck and Ajzen (1991) research present curiously how intentions plays a role to commit academic dishonesty (that is plagiarism and cheating) among students and this had set the stage for this present study.

Indeed, intentions have been shown to be related to attitudes and across a variety of academic dishonesty behaviours (Beck & Ajzen, 1991; Harding, Mayhew, Finelli & Carpenter, 2007). Intentions to cheat correlated strongly with cheating behaviour (Beck & Azjen, 1991), academic misconduct behaviour (Stone, Jawahar and Kisamore, 2010) and academic dishonesty behaviour (Harding et al, 2007). Studies have shown that intentions to engage

in academic dishonesty are a significant predictor of academic dishonesty behaviour (Mayhew, Hubbard, Finelli, Harding, & Carpenter, 2009; Stone et al., 2010). Mayhew et al. found that intentions to cheat were strongly related to cheating behaviour in undergraduate engineering and humanities students. Intention has also been found to be a significant predictor of academic misconduct behaviours (Stone et al, 2010). In Ghana, University of Ghana (UG) has recorded a wide spread examination malpractice. Mr. Kwadzo Tibri Asenso -Okyere, the son of the then Vice-Chancellor, Professor, Kwadzo Asenso- Okyere, was alleged to be the principal architect. The University was plugged into crisis as the Vice-Chancellor was asked to step aside until the committee finished its work. The Mfodwo Committee set up to investigate the malpractices indicted some senior members of the University (The Daily Graphic, 3rd July 2006). Though evidence abounds in Ghana, it looks as if the phenomenon is yet to attract sufficient scholarly attention of educational researchers except newspaper reports. The purpose of this study was to ascertain the relationship between the mediation effect of intention and attitude of undergraduate students towards academic dishonest behaviours in public universities in Ghana.

Hypotheses

1. H_0 : there is no statistically significant relationship between attitude toward academic dishonesty and academic dishonesty behaviour among undergraduate students in public universities in Ghana.
 H_1 : there is a statistically significant relationship between attitude towards academic dishonesty and academic dishonesty behaviour among undergraduate students in public universities in Ghana.
2. H_0 : there is no statistically significant relationship between intention and academic dishonesty behaviour among undergraduate students in public universities in Ghana.
 H_1 : there is a statistically significant relationship between intention and academic dishonesty behaviour among undergraduate students in public universities in Ghana.
3. H_0 : There is no statistically significant effect of the mediation effect of intention on attitude towards academic dishonesty among undergraduate students in public universities in Ghana.
 H_1 : There is a statistically significant effect of the mediation effect of intention and attitude towards academic dishonest among undergraduate students in public universities in Ghana.

Methodology

The study adopted a correlational survey research design. Three (3) universities were selected from the five (5) public universities (public universities which are more than 10 years old) using simple random sampling technique. A total of 1,200 students were selected from 22, 458 students across the universities using table of random numbers method of the simple random sampling technique to participate in the study. Structured questionnaire was developed and used for data collection of the study. It consisted of three sections. The first section assessed prevalence of academic dishonest behaviours with sixteen (16) items. The second section assessed intention to commit academic dishonest behaviour with five (5) items. The third section assessed attitude of students towards academic dishonest behaviour with 10 items. All the items were closed-ended items and were polytomously scored. Reliability index for this scale was 0.79. The administration and collection of the instruments were done simultaneously to ensure prompt response and effective delivery from the students. The research hypotheses 1 and 2 were analysed using Pearson Correlation Coefficient whilst hypothesis 3 was analysed with Structural Equation Modelling (SEM). The main variables of interest were academic dishonesty, attitude and intention to engage in academic dishonesty.

Results

Hypothesis 1

Hypothesis 1, states that there is no statistically significant relationship between students' attitude towards academic dishonesty and academic dishonest behaviour among undergraduate students of public universities in Ghana. The results of the Pearson Correlation Coefficient are presented in Table 1.

Table1: Results of Pearson Correlation Coefficient between Attitude and Academic Dishonesty

		Academic Dishonesty	Attitude
Academic dishonesty	Correlation	1	
	Sig (2-tailed)		
	N	0	
Attitude	Correlation	-.085	1.000
	Sig (2-tailed)	.000	
	N	1193	0

*p< 0.05 (2-tailed significant results)

Table 1 showed that the correlation between students’ attitude and academic dishonesty is -.085 which is small (Cohen, 1988). This implies that a weak negative relationship existed between attitude towards academic dishonesty and academic dishonesty. Though a weak relationship, it reveals that as students’ attitude towards academic dishonesty increases, there is a small increase in their ability to indulge in academic dishonesty. In other words, as students hold positive attitude towards academic dishonesty, they are likely to engage in academic dishonest behaviour but when they hold negative attitude towards academic dishonesty, they are not likely to engage in academic dishonest behaviour. This is an inverse relationship. As a result, the null hypothesis that there is no statistically significant relationship between students’ attitude towards academic dishonest and academic dishonest behaviour among undergraduate university students in Ghana is rejected.

To ascertain how much variance, the attitude towards academic dishonesty and academic dishonesty shared, the coefficient of determination was calculated to be 0.0072 which indicates that, 0.72% shared variance. Thus, attitude towards academic dishonesty helps to explain 0.72 percent of the variance in students’ actual academic dishonest behaviour.

Hypothesis 2:

Hypothesis 2 states that there is no statistically significant relationship between intention and academic dishonesty among undergraduate students in public universities in Ghana. The results of the Pearson Correlation Coefficient are presented in Table 2:

Table1: Results of Pearson Correlation Coefficient between Intention and Academic Dishonesty

		Academic Dishonesty	Attitude
Academic dishonesty	Correlation	1	
	Sig (2-tailed)		
	N	0	
Intention	Correlation	.265	1.000
	Sig (2-tailed)	.000	
	N	1193	0

*p< 0.05 (2-tailed significant results)

Table 2 showed that the correlation between students’ intention and academic dishonesty is .265 which is small (Cohen, 1988). This implies that a weak positive relationship existed between intention towards academic dishonesty and academic dishonest behaviours. It reveals that as students’ intention

towards academic dishonesty increases, their academic dishonest behaviour increases. In other words, as students hold high intention towards academic dishonesty, they are likely to engage in academic dishonest behaviour. As a result, the null hypothesis that there is no statistically significant relationship between students' intention towards academic dishonest and academic dishonest behaviour among undergraduate university students in Ghana is rejected.

To ascertain how much variance the intention towards academic dishonesty and academic dishonest behaviour shared, the coefficient of determination was calculated to be 0.07 which indicates that, 7 % shared variance. Thus, intention towards academic dishonesty helps to explain 7 percent of the variance in students' actual academic dishonest behaviour.

Hypothesis 3

Hypothesis 3 states that there is no statistically significant effect of the mediation effect of intention on attitude towards academic dishonesty among undergraduate students in public universities in Ghana. Results for the structural model assessment on the mediation effect of intention on the relationship between attitude and academic dishonesty are presented in Table 3 and Fig. 1.

Table 3: SEM Parameter Estimate on the Mediating Effect of Intention on the Relationship between Attitude and Academic Dishonesty

Source of Variation	Relationship	Path Estimate	t- statistics	p-value
	Attitude→AD	-0.085	2.194	0.027
	Attitude→int	-0.228	5.840	0.000
Total effect	Int→AD	0.265	7.617	0.000
Indirect effect	Attitude→AD	-0.061	4.590	0.000
VAF	0.421			

*Note: VAF=indirect effect/ (Direct effect + indirect effect). *sig at $\alpha = 5\%$.*

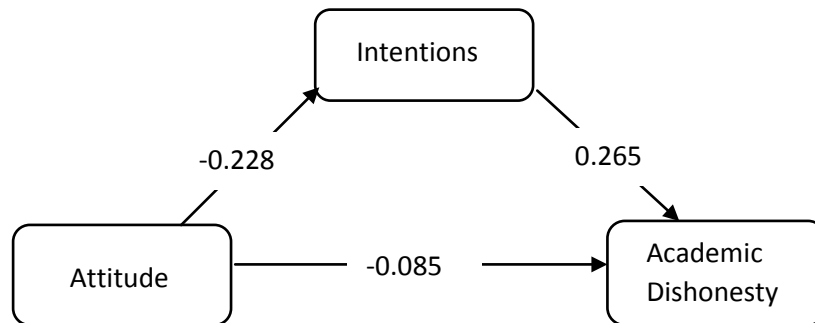


Figure 1: Mediating Effect of Intention on Attitude to Academic Dishonesty.

Table 3 and Fig. 1 showed that the direct effect of attitude on academic dishonest behaviours was negative but it was however significant ($r = -.28$, $\beta = 0.085$, $p = 0.027$). The mediating role of intention in the model produced an indirect effect on academic dishonest behaviours which was also significant ($r = -.54$, $\beta = 0.61$, $p = 0.00$). Hair, Black, Babin, and Anderson (2014) recommend that for mediating effects to be considered, variance accounted for (VAF) should be greater than 0.2. In this study, VAF value was greater than 0.2 but less than 0.8 would be considered as partial mediation while values greater than 0.8 are considered as full mediation. Again, to establish the total variance accounted for (VAF) by attitude in academic dishonest behaviour, mediating effect of intention on the relationship between attitude and academic dishonesty was analyzed.

Explanation of the model in Table 3 showed that intention was mediating the relationship between attitude and academic dishonesty. However, it could be seen that the mediating effect was partial since Variance Accounted For (VAF) which is 0.42 (42%) was less than 0.8 (80%). The practical implication of this result is that improving Attitude \rightarrow Intention and Intention \rightarrow Academic Dishonesty links would lead to an improvement in the Attitude \rightarrow Academic Dishonesty link. This implied that when students' attitude is negative (higher scores), the intention to commit academic dishonesty decreases. In the same way, when students hold favourable attitudes towards academic dishonest behaviour (low score or the same score), intention to engage in academic dishonest behaviour increases.

Discussion of findings

The importance of attitude and its relationship with behaviour cannot be over-emphasised. Societal attitude towards a behaviour gives room to the

individual and other members of the society to repeat or extinct the behaviour. It is obvious from the result that university students' attitudes towards academic dishonest behaviour are likely to nurture or discourage the occurrence of academic dishonesty. The result is consistent with those of past studies on academic cheating that also suggest that individuals are more likely to engage in cheating behaviours that they perceived as less serious (McLaughlin & Ross, 1989). Lim and See (2001) study on undergraduates in Singapore found a correlation index of -.20 between students' attitude towards cheating and their actual cheating behaviour. This finding agrees with the study of Harding, Mayhew, Finellis and Carpenter (2007) which reported a statistically significant correlation coefficient of .39 between the attitude towards academic dishonesty and dishonest behaviour (cheating) of undergraduate students. The finding also is in consonance with Beck and Ajzen (1991) study which reported a statistically significant correlation coefficient of .22 on 146 undergraduate Psychology students' cheating behaviour and their attitudes towards cheating. It should be noted that attitude denotes the sum of a person's feelings, ideas, fears and threats about a specific phenomenon (Oppenheim, 1992); hence the result is not surprising.

The result implied that a rise in intention to commit academic dishonesty will lead to an increase in academic dishonest behaviour. This confirms Carpenter and Reimers (2005) study where there was a strong relationship between intention and behaviour, with intention as a function of attitude. It is understandable that when students place favorable attitudes towards academic dishonesty, their intention will increase with the belief that academic dishonesty will occur and vice versa. This finding conforms to Whitley's (1998) study which found out that students with favourable attitudes towards academic dishonesty were more likely to engage in academic dishonest behaviour than students with unfavorable attitude. Again, the finding is consistent with studies by Hardigan (2004), Magnus, Polterovich, Danilov, and Savvateev (2002) and Harding et al (2007). They also found that students who had favourable attitudes towards academic dishonesty engaged in it several times. One explanation for this finding is that, attitude denotes the sum of man's inclinations and feelings, ideas, fears and threats about a specific behaviour (Oppenheim, 1992). It is an indication that prediction becomes accurate depending on how strong attitude is, and how directly relevant the attitude is to behaviour or situation. Clearly, students' attitudes towards academic dishonesty will give room to repetition or extinction of the menace. Therefore, the statistical significance of mediating effect on attitude in predicting academic dishonesty shows that the attitudes of the students are

most likely to nurture or threaten academic dishonest behaviours in the universities.

Conclusion and Recommendations

The indirect relationship between the predictor and the mediating variable yielded appreciable results. However, the mediator variable (intention) had a partial relationship between the exogenous variable (attitude) and the endogenous variable (academic dishonesty). Based on this conclusion, it is recommended that university authorities should enforce the rules and regulations against academic dishonesty fully without fear or favour. There should be no sacred cows; all offenders including students, and others university staff who might condone and connive to perpetuate the menace should be severely punished. As part of the punishment, the university authorities should intensify publication of names and pictures of culprits who are involved in academic dishonest behaviours in the national media, university notice boards and all public places to minimise positive attitudes toward academic dishonest behaviours, intentions to engage in academic dishonesty and committing academic dishonesty.

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