

## FINANCIAL MANAGEMENT AND SAVING BEHAVIOR OF DEPED DIVISION PERSONNEL AS MEDIATED BY IMPULSE BUYING

**MARIETA BASTIDA AGABON**

DBM, Administrative Officer  
Manuel B. Guinez Sr. NHS  
DEPED- Division of Davao Oriental

**GARRY L. BASTIDA**

RL, MLIS, DBM, Faculty,  
Davao Oriental State University,  
Mati, Philippines  
Orcid.org/0000-0003-0901-898x

### ABSTRACT

This study aimed to find out the mediating effect of impulse buying on the relationship between financial management and savings behavior of DepEd division personnel in Region XI. A quantitative, correlation design was used to investigate the relationship between and among the three variables. The meditation technique was utilized to evaluate if impulse buying significantly mediates the relationship between financial management and saving behavior. An adapted survey questionnaire which was validated by experts and pilot tested was used in this study. A total of 300 regular non-teaching personnel in DepEd Region XI were the respondents of the study, determined through purposive sampling. The findings of the study revealed that the level of financial management was high as well as the level of impulse buying while the saving behavior was moderate. Significant and positive correlations were obtained between financial management and saving behavior, financial management, and impulse buying, and impulse buying and saving behavior. Results showed that financial management and saving behavior were partially mediated by impulse buying. Accordingly, impulse buying is one of the reasons how financial management can influence saving behavior.

**Keywords:** impulse buying, financial management, saving behavior, descriptive-correlation design, Philippines

### 1.0 INTRODUCTION

Many employees have been reported to have no focus on instilling their savings habits, one of the most crucial things that need to be cultivated is an individual's saving behavior. Some people are known to be impulsive when purchasing items, and their financial management and saving habits are not yet established as a habit. Some of these employees eventually take out loans, resulting in unbalanced financial management and economic distress among government workers. This issue has been a significant topic that has tested employees' attitudes and behaviors when it comes to saving and managing their finances.

People in countries such as the United States still have mixed feelings about the economy and their ability to modify their saving habits (Jappelli & Padula, 2011). Furthermore, there has been a major shift in perspective toward the pleasure derived from current availing and expenditures, both of which are inextricably linked to the future consequences of current consumption (Achar, 2012). It is frequently said that Japanese people are huge savers and that they save a lot because it is in their national character to do so and/or because of the impact of Confucian teachings, which promote frugality as a virtue (Horioka, 2007).

Furthermore, throughout the pre-independence period, Indians spent the majority of their money on consumption, with only a small portion of their income being saved. As a result, the rate of saving was extremely low, particularly among government employees (Salam & Kulsum, 2005). Similarly, Carol and Weil (1994) argue that habit development is an alternate theory that can explain the rise in employee savings during a period of fast income growth. Consumption growth may have lagged behind income growth throughout the reform period, resulting in larger employee savings, as has been found among Chinese who are considered to be thrifty. This hypothesis is backed by the empirical observation that lagged saving rates influence provincial-level differences in employees' saving over time and space, a conclusion compatible with the existence of inertia or persistence (Horioka & Wan, 2007).

Filipinos are often self-assured when it comes to their financial management. They also have a sense of entitlement that drives them to purchase items. In reality, disinformation, as well as incorrect habits and attitudes, demonstrate that the majority of Filipinos are prone to 'blind spending' and lack financial literacy. Mamaya na lang, the procrastination habit, allows them to make excuses regarding saving money due to cultural beliefs (fFE Life and lifestyle magazine editors, 2014).

For non-teaching employees in the Department of Education, achieving a better degree of financial literacy is seen as a difficult task (DepEd). Participants will have a better understanding of the impact of impulse buying on financial management and saving behavior as a result of this study. This will be extremely helpful in developing financial management methods for non-teaching workers at DepEd organizations in Region XI, Mindanao, Philippines, in the context of this study. As a result, the findings of this research may be useful to this institution and may contribute to the literature on impulse buying, financial management, and saving behavior. Although there have been some studies that look into the association between impulse buying and financial management; financial management and saving behavior, the researcher has not found one that looks into the relationship between the three variables, hence this study is being undertaken.

## **2.0 RESEARCH OBJECTIVES**

The main purpose of the study was to find out the relationship between financial management and savings behavior when mediated by impulse buying of DepEd Division Personnel in Region XI.

### **2.1 What is the level of financial management practices of DepEd division personnel in Region XI in terms of?**

#### **2.1.1 Money management;**

2.1.2 Savings management;

2.1.3 Expenditure management

2.1.4 liabilities/debt management; and

2.1.5 Investment management?

2.2 What is the level of saving behavior of DepEd division personnel in Region XI in terms of:

2.2.1 Financial literacy;

2.2.2 Spouse socialization;

2.2.3 Peer influence; and

2.2.4 Self-control?

2.3 What is the level of impulse buying behavior of DepEd division personnel in Region XI?

2.4 Is there a significant relationship between:

2.4.1 Financial management and saving behavior of DepEd division personnel in Region XI;

2.4.1.1 Impulse buying and saving behavior;

2.4.1.2 Financial management and impulse buying?

2.5 Does impulse buying significantly mediate the relationship between financial management and saving behavior of DepEd division personnel in Region XI?

## **2.6 Theoretical Framework**

This study was anchored on the theoretical perspective of Browning and Lusardi (2002) that an individual's buying behavior will affect their savings behavior and thus, financial management becomes important. Also, according to Carol and Weil (1994) habit formation is an alternative theory that can explain the rise in employees' savings during a period of rapid income growth. It is also supported by the Theory of Planned Behavior (TPB) which predicts an individual's intention to engage in a behavior at a specific time and place. It posits that individual behavior is driven by behavior intentions, where behavior intentions are a function of three determinants: an individual's attitude toward behavior, subjective norms, and perceived behavioral control (Ajzen, 1991).

## **2.7 Conceptual Framework**

This study has three variables- one independent variable, one dependent variable, and one mediating variable. The independent variable is the financial management with the following indicators: money management, which refers to how the manner an employee spends his/her

financial resources on hand; savings management, which refers to the manner the employee manages his/her funds or investment saved in the bank or in any agency for savings purposes; expenditure which refers to the manner an individual manages the expenses that is entailed in the month; liabilities, which refers to the management of the debts incurred by the employee and learning to live on a budget day by day, no matter the cause of your debt and investment, which refers to the management on the resources being invested by the employees.

The dependent variable is the saving behavior of DepEd Division personnel. This term is defined as the manner of behaving that reflects a disposition related to a reduction in expenditures affected by financial knowledge, spouse interaction, peer influences, and self-control (Thung et al, 2012). It has the following indicators: financial literacy which means the sufficient knowledge of personal finance and facts, spouse socialization which refers to openness to one’s partner in making financial decisions, peer influence, which is a factor by which individuals are encouraged to save, and self-control which is the capacity of the individual to withstand and resist temptations to consume products (Thung et al, 2012).

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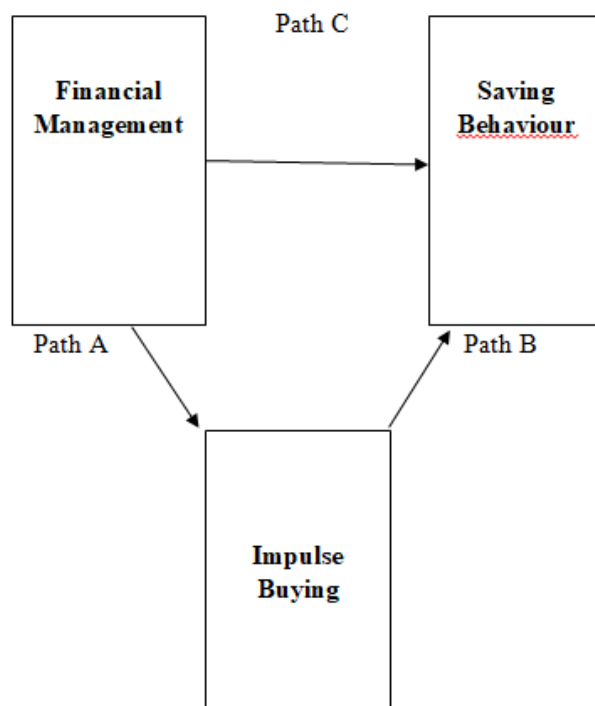


Figure 1. Conceptual Paradigm of the study

The mediating variable is impulse buying. This term refers to consumers' unplanned purchases influenced by store environment, in-store form/mannequin display, visual merchandising, and promotional signage (Kim, 2003). It has the following indicators: store environment which refers to any kind of aesthetic contribution of the merchandising establishment found in the doors and windows of the store in order to attract customers, in-store form/mannequin display which refers to a creative way of presenting merchandise providing information about new products and using mannequins, visual merchandising which refers to the management of the merchandising firm according to plan-o-gram/zone-o-gram and it is used by retailers which basically involves the act of aesthetically displaying and arranging the products in such a way that the consumers will get attracted and engaged in availing and purchasing their goods and services, and promotional signage.

### **3.0 METHODS**

#### **3.1 Research Design**

This study utilized the quantitative research design using the correlational technique to investigate the relationship between financial management, impulse buying, and saving behavior.

Quantitative research determines the relationship between one thing (an independent variable) and another (a dependent or outcome variable) in a population. For an accurate estimate of the relationship between variables, a descriptive study usually needs a sample of hundreds or even thousands of subjects; an experiment, especially a crossover, may need only tens of subjects. The estimate of the relationship is less likely to be biased if you have a high participation rate in a sample selected randomly from a population. In experiments, bias is also less likely if subjects are randomly assigned to treatments, and if subjects and researchers are blind to the identity of the treatments. In all studies, subject characteristics can affect the relationship you are investigating. Limit their effect either by using a less heterogeneous sample of subjects or preferably by measuring the characteristics and including them in the analysis. In an experiment, try to measure variables that might explain the mechanism of the treatment. In an unblinded experiment, such variables can help define the magnitude of any placebo effect (Hopkins, 2008).

Specifically, this study is employing the correlational research design. Correlation is defined as a statistical technique that tells us the relationship between the two variables. Meditation technique was also utilized in this study. It evaluated if mediation occurred between the independent and dependent variables with the inclusion of the third variable. Mediation refers to the consideration of how a third variable affects the relation between the other two variables (Mackinnon, Fairchild, & Fritz, 2007).

Likewise, this study employed a mediation technique. Meditation technique Wall (2012) said that strategy focus on the "how" and "what" of the process, but fail to take into consideration when particular techniques are used. To improve our understanding of mediation strategies in general, the authors of this article propose a new methodological approach that includes an analysis of the particular techniques that are used as well as the order of their use.

#### **3.2 Research Locale**

The study was conducted in the 11 divisions of the Department of Education (DepEd) in Region XI, namely: Davao City, Compostela Valley Province, Davao del Norte, Tagum City, Panabo City, Island Garden City of Samal, Digos, Del Sur, Mati, Davao Oriental, and Davao Occidental.

The possibility for the general applicability of the findings shall be limited by the scope and the sample. Davao Region, formerly called Southern Mindanao (Cebuano: Habagatang Mindanao; Filipino: Timog Mindanao), is an administrative region in the Philippines, designated as Region XI. It is situated at the southeastern portion of Mindanao, comprising five provinces: Compostela Valley, Davao del Norte, Davao del Sur, Davao Oriental and Davao Occidental, the newly created province.

Davao Region is the most populous region in Mindanao and the 7th most populous in the country, with a total of 4,893,318 inhabitants in 2015. Davao City, its regional capital, is also the largest city in Mindanao, with an area of 2,444 km<sup>2</sup>, the largest in the country and one of the largest in the world, and has 1,632,991 inhabitants in 2015, making it the fourth most populous city in the country and the most populous city proper in the entire Visayas-Mindanao region. The respondents are located in the five provinces: Compostela Valley, Davao del Norte, Davao del Sur, Davao Oriental and Davao Occidental, the newly created province.

### **3.3 Research Respondents**

The respondents of the study were the DepEd division personnel of the 11 Divisions of Region XI, namely: Davao City, Compostela Valley province, Davao del Norte, Tagum City, Panabo City, Island Garden City of Samal, Digos, Del Sur, Mati, Davao Oriental and Davao Occidental. In particular, the respondents were those non-teaching personnel who are permanently employed with different job titles, lengths of service, ages, and gender. Those employees who are teachers were not included. In addition, respondents were chosen since they are in line with the field of the study dealing with accounting, finance, budget, marketing, and human.

There were 300 respondents obtained. Of the total respondents, there were 29 or 9.67 percent of respondents from division A; 26 or 8.67 percent from respondents for division B; 20 or 6.67 percent from respondents for division C; 30 or 10 percent of respondents from division D; 27 or 9 percent of respondents from division E, 29 or 9.67 percent of respondents from F, 25 or 8.33 percent of respondents from G; 30 or 10 percent of respondents from H; 24 or 8 percent of respondents from I; 30 or 10 percent of respondents from J; and 30 or 10 percent of respondents from K.

### **3.4 Research Instruments**

This study used an adapted questionnaire from the different authors. The researcher used three (3) sets of questionnaires. One is for the financial management and the other one dealt on savings behavior and the last one is the questionnaire on impulse buying behavior of the DepEd employees of Region XI.

The first set of questionnaires on financial management was adapted from the study of Sydney Wong (2013). It has (5) indicators: money management practices; savings management practices; expenditure management practices, liabilities/debt management practices; and investment management practices with the following Cronbach alpha as follows: .88, .80, .65, .68, 78 respectively.

The second set of instruments embarked on the saving behavior of DepEd Division personnel. It was composed of four (4) indicators namely: financial literacy, spouse socialization, peer Influence, and self-Control with the following Cronbach alpha .92, .82, .82, .86 respectively. For the savings behavior, the questionnaire was adapted from the study of Thung et. al (2012).

The third set of questionnaires was adapted from the study of Thung et al., (2012) deals with the impulse buying with (4) indicators; store environment, in-store form/ mannequin display, visual merchandising, and promotional signage with the following Cronbach alpha .88, .75, .92, .90 respectively. In evaluating the level of impulse buying of DepEd Division personnel.

### **3.5 Data Collection**

In conducting research, certain procedures were observed. In doing so, ethical procedures were observed too. Hence, this study underwent the following procedures upon gathering the data to answer the objectives of this study. The researcher first asked permission from the Dean of the Graduate School. Upon being approved, the Principals of the schools in Region XI were also requested to conduct the study. After having sought the approval of the Principals, the researcher asked the respondents for their voluntary participation to take part in the conduct of the research by answering the questionnaire. Before the conduct of the study, the respondents were oriented and made them understand the objectives, procedure, and advantages of the study.

Given the time frame of two weeks, the researcher retrieved all the questionnaires and tabulated the data gathered from the respondents, and sent them data to the statistician assigned via email for statistical analysis.

After the statistical result had been given, the researcher analyzed and interpreted the data. Finally, conclusions were drawn from the findings of the study, and recommendations were formulated based on the conclusions of the study.

### **3.6 Statistical Treatment of Data**

Mean and standard deviation was used to determine the central tendency and the dispersion of data.

Also, Pearson Product Moment Correlation was used to determine the linear relationship between impulse buying, financial management and saving behavior. Furthermore, Regression Analysis was used to determine the beta coefficients of the interrelationship of the three variables as input to mediation analysis.

Moreover, Medgraph was used to determine the significance of the mediating effect of the mediator on the relationship between financial management and saving behavior. Likewise, The Sobel test is basically a specialized t-test that provides a method to determine whether the reduction in the effect of the independent variable, after including the mediator in the model, is a significant reduction and therefore whether the mediation effect is statistically significant.

### **3.7 Ethical Considerations**

To establish the ethical consideration of the study, the researcher shall ask the permission of the Schools Division Superintendents of the eleven divisions of Region XI. Orientation followed regarding the purpose of the study and the contents of the informed consent. The researcher mentioned that any risks, discomforts, or inconveniences were not likely to happen. But if discomfort became a problem, the respondents may discontinue their participation without further demand.

Moreover, the researcher personally supervised and administered the questionnaire to the respondents. To ensure confidentiality and privacy, the respondents placed the answered questionnaire inside a sealed envelope and submitted it to the researcher personally. Also, the names of the respondents were not mentioned during the data presentation to maintain confidentiality.

## **4.0 RESULTS AND DISCUSSION**

### **4.1 Financial Management**

Elucidated in table 1 is the level of financial management of DepEd personnel in region XI. The Financial management contained four components, namely: window display, in-store form/ mannequin display, visual merchandising, and promotional signage. The standard deviation from tables one to three ranges from .82 to 1.24 which is below 4.0. This means a typical standard deviation indicating that there is homogeneity among respondents.

In terms of money management practices, the DepEd personnel has a means of 3.67 or high. This means that the money management practices of non-teaching personnel in Deped greatly affect savings behavior. The findings work parallel with the study of Simerly, Li & Bass (2012) who claims that personal income includes compensation from a number of sources including salaries, wages, and bonuses received from employment or self-employment; dividends and distributions received from investments; rental receipts from real estate investments, and profit-sharing from businesses.

Furthermore, financial markets are that of an investment professional making investment decisions for large pools, such as mutual funds or pension plans. It is considered a part of the larger issue of consumerism and has been taught as part of consumer education courses (Garman & Bach, 1995; Glade, 1991)

In savings management practices has a mean of 3.56 or high, which means that mostly setting aside money for future needs such as children's education, emergency & retirement; setting aside money for my wants such as traveling is a priority. Such findings are consistent with



the study of Greenspan and Woods (2016) that individuals should focus on money management, particularly on the saving behavior of an individual.

**Table 1: Level of Financial Management**

Variable	Mean	Descriptive
Money Management Practices	3.89	High
Saving Management Practices	3.58	High
Expenditure Management Practices	3.56	High
Liabilities/Debt Management Practices	3.55	High
Investment Management Practices	3.29	Moderate
<b>Overall Mean</b>	<b>3.58</b>	<b>High</b>

In terms of expenditures management practices, comparing prizes for major was the and spending more than one can afford has a mean rating of 3.56 or high. This result is constant with the study of Mithani (1992) who said that several of reasons induce individuals to save for the future and equally other factors to reduce their savings. Usually, while choosing goods for use, people prefer higher quality goods to lower quality goods with a view to improving their standard of living. These social needs vary from one to another depending upon his age, occupation, social, marital status etc.

Moreover, liabilities/debt management practices have a mean of 3.55 or high. This means that setting credit limits based on my monthly/yearly income; having to use credit card/borrowed money whenever one does not have enough money in the bank or cash to meet monthly commitments is the less priority. The finding is in parallel with the work of Fujita, et al (2006) that the consumers should always bear in mind that whatever action is made has an underlying consequence. Thinking ahead of the consequences of one's action will aid in self-control on overspending. The foreseen effects will motivate the individual not to resort to spending much because it has been viewed that it could cause a drastic change in their financial capacities

Furthermore, in investment management practices, investing that is in line with one's personal interest and passion has the highest priority. Whereas investing in different investments i.e. share, bond, unit trust real estate with minimal knowledge and understanding got the less. This is consistent with the study of Phipps and Burton (1998) that household income, education levels of husband and wife, region, level of urbanization, age, and a number of children is of great importance to the household utility curve. Income earned by the wife is more likely to be used for restaurant food, her clothes, and kids' clothes. Whereas the husband's income is allocated towards transportation, they considered clothing as a personal private good and it increased with the levels of income of each individual.

The Financial Management overall mean was 3.58 or high. This means that the DepEd non-teaching personnel agree with the financial management statement. The results are consistent with the findings of Kempson, Collard and Moore (2006) that skills and ability to manage financial resources are essential for daily life activities as they help people to deal with the day-to-day financial matters and make right decisions in spending between needs and wants. Furthermore, the results are congruent with the study of Norvilitis, et al. (2006) that financial

management is necessary as it has become essential that individuals get the skills to be able to survive in future with satisfaction.

The high level for saving management practices indicated that financial management was often observed by the division personnel. This is coherent from the study of (Karlan et al., 2014) saving money can be of great help towards attaining economic stability from single person and to the society in general for the common good. The mean rating for this indicator which has 3.58 was the result of the high scores given by the division personnel to the specific items in the questionnaire appended in this study. This include save fixed amount or percentage of monthly income, set aside money for future need such as: children's education, emergency, and retirement. Lastly, set aside money for wants such as traveling.

In addition, it shows that the results are similar with the findings of Carol and Weil (1994) that habit formation is an alternative theory that can explain the rise in employees' saving during a period of rapid income growth. Moreover, this is also consistent with the study of Khrishnamra (2010) that the objective of saving is for retirements and the level of education has prominent impact on the determinants of saving form, thus they tend to save through traditional saving.

The high level for expenditure management with the mean rating of 3.56 is often observed by division personnel. The items are as follows: track some or all expenses, compare prices for major expenses, and often spend more than one can afford. The high rating given by the respondents on these specific items is an indication of a good financial management among division personnel which led to the high level of liabilities/debt management with the rating of 3.55 which is often observed by the division personnel. The items are as follows: pay off the full credit outstanding amount every month to avoid financial charges, have to use credit card/borrowed money whenever one does not have enough money in the bank or cash to meet my monthly commitments, pay mortgage and purchase installments on time every month, take up personal loan at least once a year to pay off other debts, and set credit limits based on monthly/yearly income. This is in agreement with the findings of Bryan et al (2010) that there should be planned expenditures of the individual so that there will be no overindebtedness.

#### **4.2 Impulse Buying**

Table 2 showed the level of impulse buying of DepEd of non-teaching personnel in region XI. The impulse buying contained four components, namely window display, in-store form/mannequin display, visual merchandising, and promotional signage.

The window display has a mean rating of 3.68 or high. It means that the impulse buying of Deped non-teaching personnel are observed. This study supported by the claimed of Ghani Imran & Jan (2011) consumers are also easily attracted to marketing strategies such as fanciful designs and presentations of products, price discounts and all other advertising techniques including the alluring design in products'

In the measures of in-store for/mannequin display; getting an idea of what one wants to buy after looking through in-store. form/ mannequin display and tending to buy clothing that one likes on in-store form/mannequin display are factors to consider in buying. It means that impulse buying of DepEd non-teaching personnel is observed in the institution.

**Table 2: Level of Impulse Buying**

Variable	Mean	Descriptive
Window Display	3.68	High
In-store Form/Mannequin Display	3.43	High
Visual Merchandising	3.47	High
Promotional Signage	3.94	High
<b>Overall Mean</b>	<b>3.63</b>	<b>High</b>

Accordingly, positive impact on impulsive buying is taken into account by the advertising strategies that promote the products, the aesthetic appeal of the display, and the store atmosphere and the lowered prices offered to the consumers. In the same way, the mood and the nature of the consumers affect the occurrence of impulsive buying (Sabir, Sheikh, & Shah Nawaz, 2015).

On the other side, in the visual merchandising has a mean rating of 3.47 or high. It means that the impulse buying of non-teaching personnel are highly observed. Based on the study conducted that positive impacts on impulsive buying are taken into account by the advertising strategies that promote the products, the aesthetic appeal of the display, and the store atmosphere and the lowered prices offered to the consumers.

In terms of promotional signage respondents considers the item under tending to buy products with an interesting promotional offer (reduced price, sales promotion) on in-store signs and liking to make an unintended purchase if the clothing has a sale or clearance sign is eye-catching. This means that the respondents of the study are highly involved in impulse buying and performed by the non-teaching personnel of DepEd region XI. The result is supported by Hausman and Saif (2009) who claims that several affecting factors such as effective advertisement, promotional advocacies, vending abilities and customer relations is regarded as factors that influence impulse buying.

In addition, impulse buying has been greatly affected by the capabilities of the consumers to interact socially, social dimension mechanism of the buyers. Moreover, the emotional dimension of the consumers has impacted impulse buying as can be seen on the eagerness of individuals to go shopping when in good mood or in bad mood so as to satisfy oneself from craving and be relieved from emotional stress (Timzi, 2009).

In similar way, impulse buying is the sudden and unplanned procurement of items without prior intention to buy. It happens without reflections and even losing to ponder its advantages and disadvantage. Having no list when shopping can oftentimes make individuals to do sudden procurement of products. On the other hand, consumers are also easily attracted to marketing strategies such as fanciful designs and presentations of products, price discounts and all other advertising techniques including the alluring design in products (Ghani et al., 2011).

### 4.3 Saving Behavior

Table 3 showed the level of savings behavior among DepEd non-teaching personnel in Region XI. The savings behavior contained four indicators namely financial literacy, spouse socialization, peer influence, and self-control.

In the aspect of financial literacy respondents agree with the financial literacy statement, that when non-teaching personnel are given the best experience by the company, it will create a positive effect to the institutions. The findings of the study, shows relevance with the study that states the manner in which college students manage their money is based on several factors such as age, personality traits, and knowledge. Finance management education plays a key role in financial empowerment, as education helps consumers acquire the skills, right attitudes and relevant knowledge needed in making choices for the best of their economic, health and safety wellness (Firer and Williams, 2003).

**Table 2: Level of Savings Behavior**

Variable	Mean	Descriptive
Financial Literacy	3.68	High
Spouse Socialization	3.52	High
Peer Influence	3.09	Moderate
Self – control	2.36	Low
<b>Overall Mean</b>	<b>3.16</b>	<b>Moderate</b>

Meanwhile, in spouse socialization entails that respondents agree with the spouse socialization statement. The result is consistent with the study of Schaner (2013) that saving has been regarded positively with couples having joints accounts. Those couples who live harmoniously are more likely to experiment on mutual and joint saving account and evenly respond to the return of their investment. This can maintain household saving of their family. In the same manner, another experimental study in the Philippines revealed that spouses who took care financial matters and decided on saving effort have more tendencies to have bank deposits privately while spend the invested money in public (Ashraf, 2009).

In terms of peer influence, encouraged by friends to have a bank saving obtain the and involving friends in money spending activities are common consideration. This mean that the respondents agree with the peer influence statement, that when non-teaching personnel are given the best experience by the company, it will create a positive effect to the institutions. The result can be supported with the study of Duflo and Saez (2003) that the peers have influential capabilities to give pieces of advice and bits of information regarding financial decisions and saving matters. Oftentimes, individuals are influenced by their friends and colleagues towards making up their decisions towards financial issues and concerns. Moreover, peers have also influenced individuals regarding their pension plans and benefits as well as in making payments of the availed investment.

In the aspect of self-control found out that the respondents agree with self-control statement. Results is consistent with study of Lusardi and Van Rooj (2008), regardless of how strong the inclination of the individuals to save money if he/she has no strong resistance to deny tempting consumptions on product promoted, it would be no use.

This result to the inability of the individual to meet his/her target savings account. Moreover, since there have been various temptations which could entice individuals' self-control towards facing the results of giving to this tempting consummation, they have been bombarded by consequences lowering their savings. Nevertheless, this could be copied by the careful planning and decision making in having financial literacy to avoid the detrimental effects of too much spending. The effects may vary from financial constipation to other aspects such as psychological and social dimensions because of over spending because of out of self-control (Guidolin & La Jeunesse, 2007).

The overall mean of savings behavior is 3.16, with a moderate response of the respondents. It is represented by four indicators financial literary, spouse socialization, peer influence and self-control. This means that the respondents of the study are highly agreeable with the statements.

The result is consistent with the study of Delafrooz and Laily (2011) that the lack of this background information will lead to downfall of the individual financial management because of various determining factors such as personal decisions on handling finance, tired of intricacies of financing, and even the lack of allotted time to learn may hinder the attainment of financial stability.

However, these hindrances boost the individual's capabilities to overcome financial intricacies if taken into account. In addition, this knowledge on financial matters will influence on the financial dilemma whereby the knowledge on financing will lessen the burden more particularly those with greater savings (Hilgert, et al 2003).

#### **4.4 Significant Relationship between Variables**

Shown in Table 4 are the results of the relationship between independent variable which is financial management, dependent variable which is saving behavior and mediating variable which is impulse buying. Bivariate correlation analysis using Pearson product moment correlation was employed to determine the relationship between the variables stated.

Based on the first correlation analysis, financial management and saving behavior revealed a computed r-value of 0.66 with a probability value of  $p= 0.000$  which is significant at the 0.05 level. This suggests that the higher the level of financial management, the higher will be the saving behavior. Since the p value is less than 0.05, the null hypothesis is rejected.

Therefore, there is a significant influence between financial management and saving behavior of the division personnel. This is consistent with the study of Delafrooz and Laily (2011) that financial management inclined the saving behavior whereby individuals with low level of financial management are not intended to save and eventually encounter financial problems in future. Thus, increase in financial knowledge can lead to better saving behaviour (Hilgert, Hogarth, & Beverly; 2003).

In addition, Business India (1999) saving level of a person shows his efficiency, frugality, and preservation of the present earning for future. There are triangular relationships between income, consumption (expenditure) and savings.

It is said and believed that through savings one's future is, however, assured to some extent. Saving is the primary stage of securing life but subsequent steps are to be resorted. For that savings should be converted into investments, whereby some value is added to the savings. Income earner must plan for savings and its investment in a mode best suited to him.

This practice is described as management of personal finance, which, as a discipline, gained prominence in recent years.

In the same manner, the second correlational analysis between financial management and impulse buying revealed a computed r-value of .502 with a probability value of  $p=0.000$  which is significant at the 0.05 level. This suggests that the higher the level of financial management, the higher will be their level of impulse buying. Therefore, there is a significant relationship between financial management and impulse buying. This suggest that financial management positively and significantly relate with impulse buying. This implies that financial management has a positive influence on the impulse buying of division personnel.

**Table 4: Significant Relations between Variables**

Variables Pair	Correlation Coefficient	p-value	Remarks
<i>Financial Management and Saving Behavior</i>	.660	.000	Significant
<i>Financial Management and Impulse Buying</i>	.502	.000	Significant
<i>Impulse Buying and Saving Behavior</i>	.486	.000	Significant

The finding is in coherence with the study of Ajzen (1991) who predicted an individual's intention to engage in a behavior at a specific time and place. It posits that individual behavior is driven by behavior intentions, where behavior intentions are a function of three determinants: an individual's attitude toward behavior, subjective norms, and perceived behavioral control.

The result of the study supports the study of Bagozzi (1994) that states that three general personality factors, lack of control, stress reaction, and absorption, were found to be related to impulse buying tendencies. The lack of control dimension demonstrates that a general characteristic of impulsivity may lead to acting impulsively in a specific consumption context. The association with stress reaction suggests that impulse buying may serve a mood regulating function for some people. Finally, the relationship between absorption and impulse buying suggests that some people may be particularly susceptible to environmental stimuli that can contribute to their impulsive behavior.

The last correlational analysis was employed between impulse buying and saving behavior which revealed a computed r-value of 0.486 with a probability value of  $p= 0.000$  which is significant at the level of 0.05 level. This suggests that the higher the level of impulse buying, the higher will be the level of saving behavior. Since the p value is less than 0.05, Therefore, there is significant relationship between impulse buying and saving behavior. This suggests that impulse buying positively and significantly relate with saving behavior of division personnel. This indicates that impulse buying has a positive influence on the saving behavior of division personnel.

This is consistent with the study of Browning and Lusardi (2002) which stated that the act of buying basically affects ones saving behavior that portrays the difference between income and existing consumption. It has influenced the present saving actions towards dealing with the monetary measures and values in the future consummation of the levels of the input and output of money which could be uncertain with regards to the changes of monetary value. This study is supported by the concept of Fisher (1930) and Samuelson (1937) who pronounced that saving results as an interchange between present consumption and future consumption.

Likewise, the result is also supported by the proposition of Modigliani (1986) who mentioned that saving is attained when income exceeds spending. Furthermore, Fisher and Montalto (2011) explained that buying behavior is dependent on earnings and consumers buying decisions influence one's goal to save. The current study follows the ideas and practices towards saving as directly influence impulse buying to reflect present consumption and future utilization of money in adherence to government employees' personal choice in exercising saving behavior.

#### **4.5 Mediation Analysis**

The data was analyzed using regression method as an input to the Medgraph. In Table 5, the result of the regression is shown. Mediation analysis was developed by Baron and Kenny (1986). Mediation refers to the consideration of how a third variable affects the relation between the other two variables (MacKinnon, Fairchild, & Fritz, 2007). There are three steps to be met for testing mediational hypotheses.

In table 5, steps are categorized 1 to 3. In Step 1, the financial management as significantly predicts saving behavior of the DepEd division non-teaching personnel of Region XI. Base on the result, financial management predicts saving behavior. This is consistent with the study of Hilgert (2003) that when an individual practices financial literacy, saving money for the future is very easy.

In addition, this knowledge on financial matters will influence on the financial dilemma whereby the knowledge on financing will lessen the burden more particularly those with greater savings. Those persons with inadequate knowledge have the inclination to have financial problems particularly those who do not save and do not plan to retire. Moreover, those who have low knowledge on financial handling have the higher risk to be nailed on debt and its underlying consequences, they could even have lesser eagerness to participate in investing in the stock market which could help them in financial stability lesser to avail in

mutual funds which could alleviate their status of living, even lesser to acquire more savings and money in the most effective way because of the tendency to mismanage the money they handle and they have the inclination to have the discernment to avail of the benefits from retiring (Agnew, 2005).

In Step 2, impulse buying as the mediating variable significantly predicts saving behavior. The result is parallel with the study of Mithani (1992) that the reasons induce the individuals to save for future and equally other factors to reduce savings. Usually, while choosing goods for use, people prefer higher quality goods to lower quality goods with a view to improving their standard of living. This social needs vary from one to another depending upon his age, occupation, social, marital status etc.

**Table 5: Regression Analysis for the Different Paths**

Independent Variable (IV)	Financial Management
Dependent Variable (DV)	Saving Behavior
Mediating Variable (MV)	Impulse Buying
<b>STEPS</b>	
1. Patch C (IV and DV)	
Financial management and saving behavior	
B (Unstandardized regression coefficient)	.679
e(Standard error)	.045
p – value	.000
2. Patch B (MV and DV)	
Impulse Buying and Saving Behavior	
B (Unstandardized regression coefficient)	.430
e (Standard error)	.045
p – value	.000
3. Patch A (IV and MV)	
Financial Management and Impulse Buying	
B (Unstandardized regression coefficient)	.583
e (Standard error)	.058
p – value	.000



4. Combined Influence of MV and IV on DV	
Impulse Buying and Financial Management and Saving Behavior	
B (Unstandardized regression coefficient)	.183
SE (Standard error)	.043

**\*Significant**

Likewise, habit is a major determinant of consumption pattern. Generally, everyone will have a well-established set of habits in purchasing goods or spending. Both social status and habit of investors relatively influence them to improve the standard of living by consuming high-quality goods. A section of the public believes that high quality goods can provide comfort, convenience and beauty. This is also consistent with the study of Browning and Lusardi (2002) that when an individual buying behavior will affect their savings behavior and thus, financial management is important. Also, according to Carol and Weil (1994) habit formation is an alternative theory that can explain the rise in employees' saving during a period of rapid income growth. It also supported with the Theory of Planned Behavior (TPB) predicts an individual's intention to engage in a behavior at a specific time and place. It posits that individual behavior is driven by behavior intentions, where behavior intentions are a function of three determinants: an individual's attitude toward behavior, subjective norms, and perceived behavioral control (Ajzen, 1991).

Furthermore, Wilcox (1994) said that there is a triangular relationship between income, consumption (expenditure) and savings. It is said and believed that through savings one's future is assured to some extent. Saving is the primary stage of securing life, but subsequent steps are to be resorted. For that, savings should be converted into investments, whereby some value is added to the savings. Income earner must plan for savings and its investment in a mode best suited to him.

In step 3, financial management significantly predicts impulse buying. Lusardi (2009) suggested that when a person is financially stable or income increases this can resort to a person to increase his buying habits. This further explain that taste and preferences of consumer changes when income increases some factors includes social status, age, educational attainments, peer influence etc. In addition, Kwang (2005) had analyzed the effect of income as well as other economic and social demographic characteristics on household's consumption expenditure significantly among different groups. Furthermore, the educational attainment of the consumers effects on how an individual manages his financial condition ensuring a more secured financial issues in the future. Financially literate individuals can actually prepare their budget that focuses only on necessities by comparing their proposed expenses to their actual expenses so that they are not influenced by unplanned expenditures and tempting fashionable expenses. By doing so, an amount of saving is at hand every time they receive their monthly income. While those who have little knowledge might suffer difficulty in handling monetary matters since they lack background information on financial management (Bodie, 2002; Hilgert & Hogarth, 2003; Krishnamoorthi, 2009; Mathivannan & Selvakumar, 2011).

Since the three steps, path a, b, and c, are significant, further mediation analysis through Medgraph was used involving Sobel z-test to assess the significance of the mediation effect.

If the relationship of the independent variable on dependent variable becomes insignificant, full mediation will be achieved. It means that the mediator variable mediated all the effects on the dependent variable. If the regression coefficient is reduced at the final step but still significant, it means that part of the independent variables is mediated by the mediator but other parts are directly casual effect or mediated by the variables not included in the model. Based from the result in Step 4, the combined effect of financial management and saving behavior found to be significant after mediated by impulse buying.

Moreover, the result of the computation for the mediating effect. To test whether the mediator carries the influence of an independent variable to a dependent variable, Sobel z-test was used. The Sobel test is in essence a specialized t-test that offers a method to determine whether the reduction in the effect of the independent variable, after including the mediator in the model is statistically significant (Sobel, 1982). According to Baron and Kenny (1986), some sources refer to Sobel test as the delta method. It requires the standard error of b or  $s_a$  (which equals  $a/t_a$  where  $t_a$  is the t test of coefficient a) and the standard error of b or  $s^b$ . The sobel test gives an approximate estimate of the standard error of ab. Other approximate estimates of the standard error of ab have been proposed, but the Sobel test is by far the most commonly used estimate.

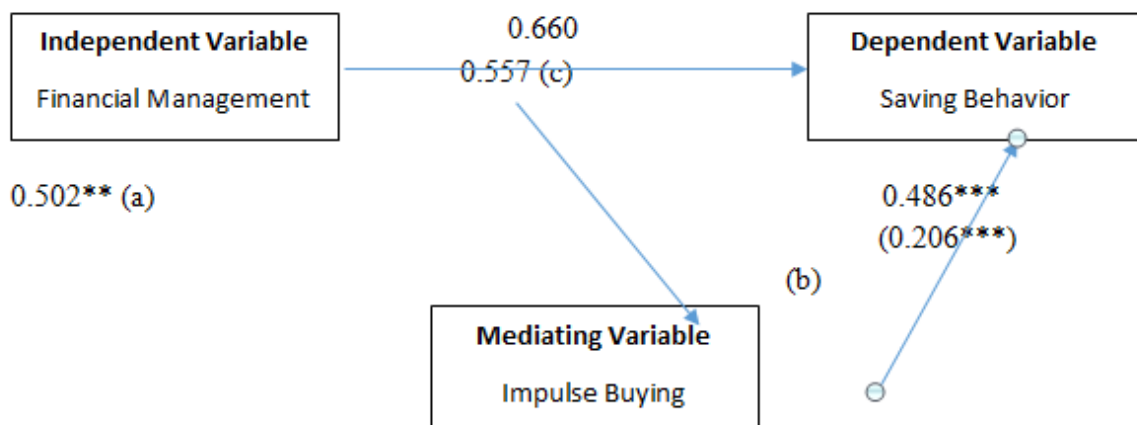
Measures and tests of indirect effects are also available with many structural equation modeling programs. These programs appear to use the Sobel formula. This only shows how acceptable the test is. The Sobel test seemed to perform best with sample sizes greater than 50 (Preacher & Leonardelli, 2001). This study has 300 samples, way above 50.

The Sobel z-test yielded a value of 3.919023 with p value 0.000089 which is significant at 0.05 level. This means that there is a partial mediation by impulse buying on the relationship between financial management and saving behavior. In addition, causal relationship between financial management and saving behavior has been reduced from a significant beta coefficient value of 0.66 to 0.557. Although the beta coefficient is reduced to 0.557 at the inclusion of impulse buying, the relationship is still significant. This means that only partial mediation is in place. This means that part of the independent variable which is the financial management is mediated by the mediator but other parts are direct casual effect or mediated by other variables not included in the model.

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**Results:**

Type of mediation	Significant	
Sobel z-value	3.919023	p=0.000089
95% Symmetrical Confidence interval		
Lower	0.05333	
Higher	0.16005	
Unstandardized indirect effect		
a*b	0.10669	
se	0.02722	
Effective Size measures		
Standardized		
Coefficients R <sup>2</sup> Measures (Variance)		
Total:	0.66	0.436
Direct:	0.557	0.232
Indirect:	0.103	0.203
Indirect to Total ration	0.156	0.467



**Medgraph Showing the Variables**

The significant partial mediation yielded only a small standard error (se) obtained by subtracting the lower limit (0.05333) from the upper limit (0.16005) and dividing the

difference by 3.92 (constant). The small se measures the precision of the estimate of the coefficient. The smaller the standard error, the more precise the estimate.

Lastly, the figure shows the result of the computation of the effect size in the mediation test conducted between the three variables. The effect size measures show how the effect of organizational communication on employee engagement can be attributed to the indirect path. The total effect of .66 is the raw correlation between financial management and saving behavior. The direct effect value of 0.557 is the size of the correlation between financial management and saving behavior with impulse buying included in the regression.

The indirect effect value of 0.103 is the amount of the original correlation between the financial management and saving behavior that now goes through impulse buying to saving behavior ( $a*b$ ) where "a" refers to path between the independent variable and mediator variable and "b" refers to the path between the mediator variable and the dependent variable. The ratio indexes the quotient between indirect effect and total effect. That is 0.103 divided by 0.66 is equal to 0.156. This means that about 15.6 percent of the total effect of the independent variable on the dependent variable goes through the mediator variable and about 84.4 percent of the total effect is either direct or mediated by other variables not included in the model.

## 5.0 CONCLUSIONS AND RECOMMENDATIONS

The findings of this study uncovered the importance of financial management and saving behavior because they affect impulse buying of division personnel. It involves knowledge of managing finances, self-control, and giving high regards in promoting saving habit. The study supports the findings of Collard and Moore (2006) agree that skills and ability to manage financial resources are essential for daily life activities as they help people to deal with the day-to-day financial matters and make the right decisions in spending between needs and wants. Also, Sanders (2008) suggest that impulsive and present-oriented individuals with little self-control are less likely to be influenced by perceived risks and future costs due to unplanned/spontaneous buying.

Furthermore, Delafrooz and Laily (2011) added to which financial management influenced the saving behavior whereby individuals with low level of financial management are not intended to save and eventually encounter financial problems in future. Thus, increase in financial knowledge can lead to better saving behavior (Hilgert, Hogarth, & Beverly, 2003).

In addition, saving money can be of great help towards attaining economic stability from single person and to the society in general for the common good. By having a stable monetary handling and saving, the person can have a home of financial balance towards making a human capital which can eventually contribute to the economic growth of the society. This can be a great way to link with others towards forming a macroeconomic stability of the entire society contributed by responsible and wise money savers. This can be foreseen with financial development among individuals within a community of financial literate people (Karlan, McConnel, Mullainathan, & Zinman, 2014).

The result of this study will give significant information and benefit that may serve as the basis for government employees either local or national agencies to formulate styles and strategies on improving buying and saving behavior of public servants giving relevant

information towards saving habit. These may provide windows for realizing the advantages of spending less and saving more so to acquire the bounty of life upon possessing different clues in saving. Moreover, the outcome of this research may provide perspicacity to all heads/administrators to provide programs on financial management to improve the saving behavior of DepEd employees. It may provide information to government employees' particularly on how impulse buying and income may affect one's saving behavior. It may develop the understanding towards saving behavior to attain quality life.

The result of this study may give inspiration to all public servants to assess their buying behavior and income that may influence saving attitude. It may help the employees to be more efficient and competent for a having quality of life that may be done through saving which may also result to rendering quality service in the public.

In addition, the results of the study may eventually benefit the customer since this study is on the mediating effect of impulse buying on the relationship between financial management and saving behavior of division personnel of DepEd Region XI. It may be an access of disseminating information to newly hired employees and customers to have a wise economic decision to have a good quality life in the future. Finally, the findings of this study may provide the future researchers a starting point how to expand the coverage of the research in terms of the variables covered in the study.

### **Conflict of Interest Statement**

The authors declare no conflicts of interest.

### **About the Authors**

**Dr. Marieta Bastida Agabon** is a graduate of Doctor in Business Management. She is an Administrative Officer at Manuel B. Guinez Sr. National High School in the Division of Davao Oriental- Department of Education.

**Dr. Garry L. Bastida** is a Registered Librarian, a graduate of Bachelor of Secondary Education major in General Science, a Master in Library and Information Science and a Doctor in Business Management. He is a Faculty at the Davao Oriental State University.

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