

SALARIES, PERFORMANCE AND MEDIATING EFFECT OF ALTRUISTIC BEHAVIOR: FRESH STATISTICAL EVIDENCE FROM THE NATIONAL BASKETBALL ASSOCIATION

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ABSTRACT

The objective of this study is to empirically examine the relationship between salary, job performance, and Altruistic Behavior and to verify whether there is any link between these three variables. Empirical research conducted by using regression analysis on a research sample of 30 National Basketball Association teams including 1566 players from the period 2012-2013 to 2015-2016. The findings of this study indicate that salary is positively correlated with altruistic behavior and also with job performance. In addition, altruistic behavior has a significant positive impact on job performance and exerts mediating effect between the relationship of salary and job performance.

KEYWORDS

Job performance, Altruistic behavior, Salary, National Basketball Association, Regression

1. INTRODUCTION

This document describes, and is written to conform to, author guidelines for the journals of AIRCC series. It is prepared in Microsoft Word as a . Salary or employee compensation is a topic that generates considerable interest among practitioners and scholars. Over the past decade, many studies have been conducted on the National Basketball Association (NBA), National Football League (NFL), Major League Baseball (MLB) and the National Hockey League (NHL) with the focus of formulating strategies to see the relationship between salary and job performance. Higher salary leads to higher performance in the court and it has a positive effect on job performance as well as in the behavior. [1, 2, 3, 4]. The National Basketball Association (NBA) is the most important and famous basketball league all around the world, especially in the USA. The qualified players from different countries of the world apply to enter the NBA league to get selected by one of the thirty teams that make the study of the NBA interesting [5]. The NBA is a compilation of 30 basketball teams in the United States and Canada. In North America, it is currently the third largest sports league with approximately 7.3 billion dollars in revenue. The teams of the NBA have to face critical decisions regarding salary allocation. The players in the league provide different values to their respective team, hence are worth different amount of pay. According to [6] In the world of professional sports, it provides a unique environment to examine and study business and economic issues. It is the only industry where the face, name and life

history of every player, coach, manager, etc. is available. Furthermore, he found that the data of the National basketball association not only explains about the racial discrimination but also clarifies the whole story from beginning to end.

In 2012-2013, NBA season set a new record of 84 international players from 37 different countries and territories on NBA rosters [7]. The NBA has completed a superb activity proceeding to advance consistently, remaining current and changing as society's standards change. It has changed its rules to make the game more aggressive and entertaining. It has additionally executed rules with the expectations of making a player's pay more fair and equitable when compared to their deserved compensation. Each team can utilize a set percentage of its revenues for their pay expenses. Generally, a single player can get the maximum of 30 percentage of the clubs total salary cap and every team has one or two players who earn a considerable amount of money than to their teammates. The international players who entered into National Basketball Association (NBA) in the start, there is a foreign wage premium exist for them. There is less discrimination in salary among international and domestic players, who joined the national basketball association later. Though, the NBA has not always demonstrated the practice of equal salaries to its players for equal production. The existence of any form of discrimination would tarnish the reputation and much upset the players that lead to a turnover [8].

The social exchange theory proposed by [9] suggest that any exchange relation can divide into two forms in an organization that is social change relationship and economic exchange relationship. The cooperation is the main driving force in the progress and development of an organization, and altruistic behavior is helpful for the teamwork and also for the organizational performance [9, 10, 11]. An employee with altruistic behavior can make more contributions to the organization or exceed himself, which is not only helpful to his development but also to the organization's effectiveness and success [12]. [13] Investigated the relationship between investors and entrepreneurs and found that social exchange theory strongly influences the success of an entrepreneurs' funding. Because it offers access to resources like knowledge, partners, and finance. Furthermore, altruistic behavior is useful for the teamwork as well as for organizational performance.

The study of [14] on path analysis on the relationship between employees compensation, organizational commitment, job satisfaction and organizational citizenship behavior found that the more employees are satisfied with their salaries, the more they will make commitments to the organization and work. In some way, if employees have altruistic behavior despite unequal pay, it tends to produce efficiency in the organization and has stronger intention to stay in the organization.

Hence, if the coaches and managers of the team can make proper utilization of the salary to promote the altruistic behavior of players who may exceed themselves, the operational performance and efficiency will be improved. The players will be encouraged to have more altruistic behaviors to reduce the turnover intention. In this way, the organization can deal with the salary discrimination by promoting the altruistic behavior. On the other hand, the players who are satisfied with their salaries are ready to devote their time to extra work, bringing about a win-win result.

The questionnaires are often used in the study of organizational behavior and human resource, but it cannot fulfill the objective of the study as their environment background and social circumstances influence people. Therefore the results may be inaccurate with questionnaire analysis. A lot of data about professional sports like NBA, NHL, NFL MLB are available which can be used for the research and different tests, and that data is more valid and precise. Furthermore, the test result will be relatively objective as external factors cannot change these data. The easy access to precise data and practical resources in sports industry makes this study

possible. The objective of this study is to examine the relationship among salary, job performance and Altruistic Behavior of NBA players during the period 2012-2013 to 2015-2016 and to determine whether there is any link among variables.

This paper will proceed as follows. Section 2 discusses theoretical concerns and empirical literature relevant to this study. Section 3 provides the description of the dataset and presents the model and estimation procedures to be applied to player performance in the NBA. Section 4 reports the brief discussion of results. Section 5 concludes the paper.

2. LITERATURE REVIEW

2.1 SALARY AND JOB PERFORMANCE

Job performance of the employees is the key factor for the success of the organization. [15] Performed a study on National Hockey League (NHL) by using a regression analysis between salary and performance measures of 710 players. The results showed the significant positive relationship between salary and assists, career games, goals and all-star appearances. [16] did the similar study and investigated the relationship between salary and performance measures of National Hockey League by using regression analysis and furthermore one study executed by [17] on the National Football League (NFL) by using the same method. [18] Studied the relationship among salary and performance of national basketball associations (NBA) teams and players by using regression analysis. The results showed that points per game, rebounds per game and assists per game have a positive correlation with salary.

[19] recommended that job satisfaction, as well as salary satisfaction, is correlated to altruistic behavior and it will have an effect on job performance, directly and indirectly. [20] and, [14] found that the more employees are satisfied with their salary, the more helpful the behaviors towards the organization leading to higher performance. According to Chien, Lawler, & Uen [21], the payment of salary supported performance may produce a way of quality towards job performance. Scholars recommended that a satisfied employee tend to be present at work more often, be productive, makes fewer mistakes and has stronger intention to remain within the organization [22].

2.2 SALARY AND ALTRUISTIC BEHAVIOR

[23] and [24] considered that the salary should include the financial reward, a variety of essential services and welfare within the employment relationship. Salary refers to an incentive system as well as base salary, bonus, and welfare, that the employer paid to employees for their work [25]. [26] Pointed out that altruistic behavior is a positive attitude of employees towards the organization that is beyond the call of duty. Salary could have a significant effect on job involvement as well as on altruistic behavior. Altruistic behavior is also beneficial to improve productivity and quality of work, keep the organization's competitiveness and reduce the turnover rate. An employee will contribute to the growth and development of organizational performance by doing extra work willingly and without conditions [27]. The more the employee is paid, the more he feels satisfied and the more efforts he will make in job involvement. Furthermore, salary has a positive correlation with altruistic behavior [28]. The above evidence is supporting the study of [29] which showed that the level of altruism increase with individual income. According to [30] that an employees face different returns to altruistic effort. The workplace that is severely hit by the financial crisis have lower returns while higher returns are related to prosocial behaviors within the workplace

2.3 ALTRUISTIC BEHAVIOR AND JOB PERFORMANCE

Job performance refers to the excellence achieved by individuals or groups after the task is fulfilled [31]. According to the study proposed by [32], job performance is related to the record of results when the employees of the organization have achieved the goals and objectives. Job performance refers to the work, performed by the employees. They will offer skills and technology to assist others and follow the instructions of the leaders [33]. [34] Found that employees with lesser altruistic behaviors have a lower level of satisfaction than those with higher altruistic behaviors; further, altruistic behaviors persuades the employee turnover rate. Employees having lesser altruistic behavior are more likely to be absent from a job, relax at work and leave their job. [35] found that the more employees are satisfied with their job, the more helpful the behaviors towards the organization leading to higher performance.

According to [36] and [37] employees with high altruistic behaviors can dedicate themselves to extra-role behaviors like novelty and creation rather than being late or left their jobs. Generally, employees with high altruistic behaviors can create more efforts in their work and show an excellent job performance [38].

2.4 MEDIATING EFFECT OF ALTRUISTIC BEHAVIOR

According to [39] the mediation relationship is one in which the exogenous variable causes the mediator that then causes the endogenous variable. For example, the "mediated effect" is often referred to "indirect effect" as it performs the effect of the exogenous variable effect on the endogenous variable effect via the mediator variable (i.e., indirectly instead of directly). The "mediator" is constantly described as "intervening variable," an intermediate between exogenous and endogenous.

According to [40], four conditions are required to be fulfilled for a mediator variable. First, independent variable significantly affects the mediator variable. Second, mediator variable significantly affects the dependent variable. Third, an independent variable significantly affects the dependent variable. Fourth, when mediator hinders with the independent variable and affects the dependent variable, the significant impact turns into a non-significant impact. Based on the above logic judgment, the study suggested that the altruistic behavior has the characteristics of mediator variable in the relationship between salary and job performance.

3. MATERIALS AND METHODS

A unique dataset has been constructed in this study that covers four regular seasons from 2012-13 to 2015-16 including all the 30 NBA teams. The dataset comprises the information of players who participated in games during those seasons. The player's data salary, assists, and points have been taken from basketball-reference.com. Table 1 shows the definition of each variable while Table 2 presents the descriptive statistics of the variables used for estimation. The primary purpose of this study is to investigate and understand the mediating effect of altruistic behavior by studying the relationship between independent and mediator by using regression analysis. Figure 1 shows the conceptual framework of the empirical research.

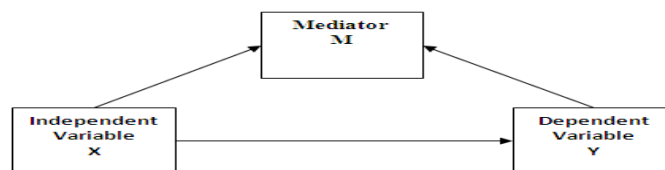


Fig. 1 Research Framework

Table 1: definitions of variable

Variables	Definition
X:Salary	A salary is a type of fixed compensation, paid to an employee for regular work.
M: Assists	The player who passes the ball to a teammate in a way that leads to a score by a field goal.
Y: Points	The number of points a player achieves.

Where X: Independent Variable (salary); M: Mediator variable (altruistic behavior) and Y: Dependant variable (job performance)

Table 2: Descriptive Statistics of variables

Year		2012-2013	2013-2014	2014-2015	2015-2016
Points	Mean	556.68	634.64	602.38	563.66
	Std. Dev.	459.31	525.98	502.85	461.21
	Min.	0	0	0	0
	Max.	2280	2914	2475	2376
Assists	Mean	125.92	138.34	135.72	124.80
	Std. Dev.	142.44	152.06	163.09	137.96
	Min.	0	0	0	0
	Max.	704	721	1076	839
Salary	Mean	4565160	4531022	4510097	4955397
	Std. Dev.	4749584	5014762	4785909	5239221
	Min.	27859	9281	29483	30888
	Max.	30453805	30453805	23500000	25000000

Source: Authors

4. RESULTS

The empirical findings show the effect of the relationship among salary, job performance, and altruistic behavior. The study confirms the effect of salary on altruistic behavior by using simple regression analysis. Table 3, we found that regarding the relationship between salary and altruistic behavior during the year 2012-2013 to 2015-2016. The model F value is significant in every year, and the overall model F value is also significant, and overall VIF value is less than 10 which shows that there is no collinearity in this regression. The overall regression coefficient $\beta=0.665$ indicates that salary has a significant positive impact on altruistic behavior.

Table 3: Regression Analysis of Salary and Altruistic Behavior

Variable	Assists (Altruistic Behavior)				
Salary	2012-2013	2013-2014	2014-2015	2015-2016	Overall
β	.419	.344	.376	.509	.665
t-value	8.966***	7.123***	8.213***	11.669***	17.283***
R^2	.176	.118	.142	.259	.442
F-value	80.397***	50.735	67.447***	136.159	298.687***
VIF					1.000

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

The study confirms the effect of altruistic behavior on job performance by using simple regression analysis. According to Table 4, it found that regarding the relationship between altruistic behavior and job performance during the year 2012-2013 to 2015-2016. The model F value is significant in every year, and the overall model F value is also significant, and overall VIF value is less than 10 which shows that there is no collinearity in this regression. The overall regression coefficient $\beta=0.846$ indicates that altruistic behavior has a significant positive impact on job performance.

Table 4: Regression Analysis of Altruistic Behavior and Job Performance

Variable	Points (Job Performance)				
	2012-2013	2013-2014	2014-2015	2015-2016	Overall
Assists (Altruistic Behavior)					
β	.750	.726	.726	.731	.846
t-value	22.016***	20.541***	21.360***	21.156***	30.796***
R ²	.562	.527	.527	.534	.716
F-value	484.701***	421.939***	456.234***	447.567***	948.403***
VIF					1.000

*p<0.05, **p<0.01, ***p<0.001

At last, the study validates the effect of salary on job performance and the mediating effect of altruistic behavior, as shown in Table 5. The F-values in model 1 and model 2 are significant. The results show that during the year 2012-2013 to 2015-2016, the regression coefficient of salary to job performance is significant and the overall β value is 0.734, indicating that overall salary has a positive impact on job performance. Therefore, it has been confirmed that independent variable has a significant positive impact on the mediator variable. It also has been confirmed that mediator variable has a significant positive impact on the dependent variable. Furthermore, it has been confirmed that the independent variable has a significant positive impact on the dependent variable. Meanwhile, in model two, the mediator variable interferes with the relationship between the independent variable and dependent variable and reduces the overall regression coefficient of salary to job performance to 0.307. In the context of the analysis referred above, the assists (altruistic behavior) is found to have a specific mediating effect.

Table 5: Regression Analysis of Mediating Effect

Variable	Year	Job performance				overall VIF
		β (Model 1)	t-value	β (Model 2)	t-value	
Salary	2012-2013	.584	13.975***	.327	9.748***	1.000
	2013-2014	.516	11.725***	.302	8.806***	
	2014-2015	.490	11.360***	.252	7.300***	
	2015-2016	.631	16.078***	.350	9.711***	
	overall	.734	20.955***	.307	9.223***	
Altruistic behavior	2012-2013			.613	18.255***	1.792
	2013-2014			.622	18.123***	
	2014-2015			.631	18.271***	
	2015-2016			.553	15.336***	
	overall			.642	19.307***	
Overall F-value		439.123***		622.460***		

*p<0.05, **p<0.01, ***p<0.001

5. DISCUSSION AND CONCLUSION

The results indicate that salary has a significant positive impact on altruistic behavior, which confirms the findings proposed by [28]. He suggested that the more the worker is paid, the more he feels fair about the job participation of others and his participation, and he will give extra efforts in job involvement, which is positively associated with altruistic behavior. Furthermore, it is also found from the findings that altruistic behavior has a positive impact on job performance. Therefore, the employees with higher altruistic behaviors give extra efforts in job performance and demonstrate an improved job performance. As per the verification of the study, the findings recommended that salary has a significant impact on job performance. At the point when altruistic behavior hinders the relationship among salary and job performance, it applies a mediating effect. This result complies the findings recommended by [41] which indicated that the more employees are satisfied with their work or salary, the more they will have excellent and beneficial behaviors towards the organization and that helps to improve performance. Finally, this study creates a considerable contribution to the observing link among salary, altruistic behavior, and job performance. The coaches and managers of the teams should wisely and efficiently use the money and promote the altruistic behavior that will be favorable for the better performance of the teams as well as for the organization.

The research findings indicate that salary can help improve job performance and that altruistic behavior has a mediating effect on the relationship between independent and dependent variable, that makes the relationship particularly important. The salary of NBA players are different according to their value in their respective teams, so it is suggested that general managers and coaches should retain talented players by giving them training about altruistic behavior. Because if the players have altruistic behavior, they give extra time to their work, perform better, work in a team and improve the performance. Therefore, general managers and coaches are recommended to build up a better culture in the organization and offer team performance incentives. So that the players have a better understanding of the value of team collaboration, hence encourage the altruistic behavior. The key point is that players could be emboldened to have more altruistic behaviors having less turnover intention. In this way, the organization could work up with the salary bias and have an excellent game. On the other hand, the players who are gratified with their salaries are ready to give their time to additional work, carrying about a win-win result.

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