

Can Public Service Motivation Reduce Corruption? Evidence from Korean
Public Servants

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ABSTRACT

At present, the majority of public service motivation research has focused on assessing relationships between public service motivation and performance indicators such as job satisfaction, organizational commitment, and job performance. However, despite of a great deal of interest in tying public service motivation to various aspects of organizational behavior, very little research on this topic has asked whether any relationship to corruption might be present, as well. Similarly, corruption research has largely concentrated upon understanding how institutional and environmental factors, as well as organizational characteristics influence corruption, but has been less interested investigating how features of personnel, such as public service motivation might also serve to influence levels of corruption. One would expect that public servants with higher levels of public service motivation would be more self regulating, and succumb less to material temptations. To this end, sources of corruption stemming from public servants dissatisfaction with items such as pay or organizational fairness, are likely to be moderated among those public servants with higher levels of public service motivation. To assess the relationship between corruption and public service motivation, 1300 South Korea public officials working in the central government were surveyed. In this era of financial crisis, governments around the world are forced to introduce numerous austere measures, which in turn are likely to generate higher levels of employee dissatisfaction, thereby providing greater potential for corruption. Therefore, particularly in times such as these, it is important to explore the relevance of public service motivation not just to performance in general, but to corruption as well.

I . INTRODUCTION

A great deal of previous literature has investigated causes of corruption within an organization by focusing on socio-cultural, institutional, and personal dispositional factors. As such, there has been relatively little research that has assessed the role of individual behavior and attitudes on influencing corruption within an organization. Extant empirical research also has used cross-country data, but rarely makes use of micro level (individual level) data. Because human beings are social creatures, and public servants human beings, it is important to examine causes of public servant corruption by focusing in particular upon public servants' social and organizational relationships and attitudes toward the organization.

Rubin & Whitford (2008; 419) emphasized the need for future research to address the relationship between individuals' public service motivation (PSM) and corruption. They argued "While we cannot perform a full test of the public service motivation hypothesis given our data, we believe that our results indicate that more research is needed on PSM's effect on reducing public corruption among civil servant." Not only PSM but also organizational citizenship behavior, attitudes toward the organization (e.g. satisfaction for pay, promotion, job stability, fairness of organization) are related to the likelihood of corruption. For these reasons, we will empirically examine how PSM and other related variables, in particular organizational behavior and attitude toward the organization reduce the likelihood of corruption.

This research has three parts. In the first part, we will address previous research and derive our hypotheses. Second, we will analyze the relationship between the likelihood of corruption and other independent and control variables. Lastly, in the third section, based on these results of the second section, we will discuss the implications for policy responses for the reducing the public corruption.

II . THEORETICAL APPROACH AND HYPOTHESES

The subject of corruption has had a long research history. Consequently, corruption has lots of definitions. Nonetheless, despite the numerous definitions of corruption, a widely cited definition of corruption is "Behavior which deviates from the formal duties of a public role because of private-regarding (personal, close family, private clique) pecuniary or status-gains; or violates rules against the exercise of certain types of private-regarding behavior (Kiltgaard, 1988, 23)." This definition is applicable to both public and private corruption. Klitgaard (1988, 24) presents two ways of approaching corruption. In his first definition, corruption was defined as a divergence between the principal's (or public's) interest and those of the agent (or civil servant), so corruption occurs when an agent betrays the principal's interests to pursue their own interest. Similarly, Collier, M.W. (2002) also defined corruption as "abuse public power for the self-interest". In our research we consider corruption as "civil servants' abuse public power for the self-interest."

This chapter will review the literature about factors which are often argued to cause

corruption so as to clarify the linkage between PSM and corruption. First we will consider the general causes of corruption. Second we will talk about the individual level factors which affect the likelihood of corruption. Third then we will address the moderating effect of PSM on the relationship between independent variables and the likelihood of corruption.

1. CAUSES OF CORRUPTION

Individual perspectives associated with corruption can be divided into three more specific categories of perspectives. The first category is the individual or actor perspective (Elazar, 1972:93-102; Burrell & Morgen, 1988:1-35). According to the Heidenheimer(1978;19-23), as well as Tilman(1968:440), corruption can be seen as a civil servant's self-interest seeking behavior, which is associate with particulars of their job, such as the level of power they have, or the nature of the task they are performing. The second category of perspectives is the cultural perspective (Huntington, 1968:59-71; Collier, 2002). Collier, M.W. (2002) stressed the importance of political culture when attempting to understand corruption; they classify political culture into collectivist, individualistic, and egalitarian categories. This kind of research, which focuses on cultural aspects, almost always uses cross-national data. Third category of perspectives is that institutional factors perspective (Myrdal, 1968:951-958; Heywood, 1997:11). Klitgaard (1998) studied the relationship between a principal's monitoring system and the prevalence of corruption. The results of the study illustrated that a principal's monitoring system could decrease levels of corruption.

Among these three factor categories, our research focused on factors associated with the individual or actor perspective and to a lesser extent institutional perspective, encompassing factors such as a merit pay system. When we explain the cause of corruption from an individual level perspective only, there may be some criticisms. For example, from such a perspective it may be difficult to find policy implications. However, these critics are right only when we focus on the individual disposition or ethical values. Instead, we focus on the individual behavior and attitudes toward the organization, which is behavior and attitudes that can be changed according to the organizations policy and will.

2. INDIVIDUAL-LEVEL FACTORS AND CORRUPTION

Rauch and Evans (2000) compared the effect of career system, merit system and salary between private and public sectors. The career system and salary comparisons didn't have a significant effect with respect to corruption, but the merit system had a statistically significant effect; more developed merit systems, which were measured by rate of competitive examinations and education, could reduce the corruption. Rubin & Whitford (2008) raised the question of whether wages were an effective means in reducing corruption. The relationship between wages and corruption was too weak to support the hypothesis. On the other hand, Van Rijckeghem & Weder(2001) found results that oppose those of Rauch and Evans. They showed that wage comparisons between civil service wages and manufacturing wages were negatively related with corruption. Becker and Stigler (1974) assume public servants also pursue interest maximization, so they argued pay increases reduce corruption. This previous research has focused primarily upon the objective wage level. *However, not only the objective wage but subjective perception of wage is very important because people act with subjective feelings, in addition to objective data.* For example, Akerlof & Yellen(1990)

derived a hypothesis of wage-effort from Adams(1963)'s theory of equity, relative deprivation theory, and social exchange theory. That is, employees expend less effort when they receive wages that fall below what is considered to be a fair wage. Martin (1981) also showed that unequal wages could stimulate a greater sense of deprivation. Although subjective perceptions of wage are important, research that has analyzed relationship between wage perception and corruption is rare. Therefore, this research focuses on the subjective satisfaction of pay.

(Perceived) Fairness of the organization is a very important issue in organizational theory. Rutte and Messick (1995) divide fairness into distributive fairness and procedural fairness. Distributive fairness focuses more on the fairness of managerial decision regarding the distribution of outcomes such as pay, promotion, or recognition. Procedural fairness addresses how such managerial decisions are derived. When employees recognize the unfair treatment by the organization, their behaviors and attitude regarding the organization will change. According to the relative deprivation theory, a negative discrepancy between a reference point and an outcome will lead to relative deprivation (Crosby, 1976). According to the Adams (1963) equity theory, people act to change the subjective gap with respect to output/input ratio by comparing themselves to other people, rather than by solely focusing upon the objective levels of pay. When people perceive inequality, they could act two different ways. First they can reduce their effort. Second, a more active person will exhibit high levels of corrupt behavior.

However, in the event that an employee of a public organization perceives unfair pay and treatment in the organization, those with higher levels of PSM will self-regulate and avoid corrupt behavior because that kind of behavior damages citizens. Members of public organizations who have higher levels of PSM might perceive the cost of dismissal as an expensive one. As mentioned earlier, PSM can lower the likelihood of corruption because PSM can reduce the perceived value of monetary gains to be had via corruption and inflate the cost of corruption.

According to the Organ (1988, 4)'s definition, organizational citizenship behavior is "individual behavior that is discretionary, not directly or explicitly recognized by the formal reward system, and that in the aggregate promote the efficient and effective functioning of organization". Organ suggested five categories of organizational citizenship behavior. First, altruism implies that discretionary behaviors serve to help others. Second, sportsmanship means tolerating the inconveniences of organizational life without complaining and having positive attitudes. Third, courtesy is thoughtful treatment of others. Fourth, conscientiousness is employees carrying out their tasks beyond the minimal requirement. Fifth, civic virtue is the responsible participation in the political life of organization. He redefined Organizational citizenship behavior as "contributions to the maintenance and enhancement of the social and psychological context that supports task performance" (Organ, 1997, 91). Preceding studies have focused on the antecedents of organizational citizenship behavior or relationships between organizational citizenship behavior and organizational performance (Bolino, Turnley and Bloodgood, 2002; Podanskoff and Mackenzie, 1997; Koys, 2001; Kim, 2005). Following these concepts, organizational citizenship behavior can be thought of as a discretionary behavior to help others and tolerating the inconvenience of organizational life. We can hypothesize that these behaviors can reduce the likelihood of corruption.

Swamy, Knack, Lee, & Azfar(2001), demonstrated that women exhibited less corrupt behavior than men using the World Values Survey from 43 countries. Dollar et al (2001), also showed that countries with higher rates of female participation in the public sector had reduced rates of corruption.

3. PSM AND CORRUPTION

The concept of PSM can be tied back to Perry and Wise (1990)'s article "The Motivational Bases of Public Service" which tried to find alternative motivational factors in addition to merit pay. After this research, a great deal of research has paid attention to PSM. The most recent economic crisis has made it more difficult to manage performance based pay because the government budget was reduced. These environmental changes surrounding government generated more attention to PSM as an alternative source of motivation. Despite problems related to measurement, concept, and theory, more and more research has verified the existence of PSM at work in the public sector. Research on PSM can be divided into two groups according to their attitude; one group assumes that PSM is a priori, while the other assumes PSM occurs through socialization. This research adopted the latter perspective because personal motivation could change according to changed in the environment.

A great deal of research that has tried to verify the effect of PSM has mainly focused on the performance of organizational and individual factors. But research related to the relationship between PSM and corruption was not tested empirically; Rubin & Whitford (2008) insisted on the necessity of this research.

Klitgaard (1988) suggest the possibility that corruption was increased by monopoly and discretion, but decreased by responsibility. In his theory, individuals decide to engage in corrupt behavior by accounting for the benefits and costs of engaging in corrupt behavior. Public servants also seek interest maximization, but each person's interests are not the same. For instance, certain officials may give high priority to monetary values while others place more of an emphasis upon helping other people.

According to the Adams (1963)' equity theory, people act to change the subjective gap with respect to output/input ratio by comparing themselves to other people, rather than by solely focusing upon the objective levels of pay. For example, even though one may work hard for an organization, when comparing their pay with other employees, they may reduce their efforts due to perceived inequality; it is believed that people who are more active will exhibit high levels of corrupt behavior. When people perceive unfair treatment by the organization with respect to pay, will every person behave in a corrupt fashion? It's not necessarily the case. In particular, in the event that an employee of a public organization perceives unfair pay and treatment in the organization, those with higher levels of PSM will self-regulate and avoid corrupt behavior because that kind of behavior damages citizens. So, PSM offers self-regulating power when an employee is faced with unfairness.

Members of public organizations who have higher levels of PSM might perceive the cost of dismissal as an expensive one. For instance, the people who want to work in the public sector perceive public service as being of greater value when compared to those who with lower levels of PSM. As mentioned earlier, PSM can lower the likelihood of corruption because PSM can reduce the perceived value of monetary gains to be had via corruption and inflate the cost of corruption.

In social cognitive theory, human behavior is extensively motivated and regulated by the ongoing exercise of self-influence. Albert (1991) has argued that the major self-regulating mechanism is activated through three sub-functions; self-monitoring of one's behavior (judgment of one's behavior in relation to personal standards and environmental circumstances), affective self-reaction, and self-efficacy mechanisms. Self-regulating mechanisms not only mediate external affects but also serve as a basis for purposeful action (Albert, 1991). If people are only regulated by external outcomes, they would be entirely

responsive to external influences. However, people have the ability to be self-reflective and self-reactive, thereby enabling them to control their behavior, thoughts, feelings, and motivation.

According to the social cognitive theory, the people who have high levels of PSM have stronger self-regulating power. So, the people who have higher levels of PSM will behave more cautiously when they are placed in a situation they perceive as unfair. Through the theoretical approaches, the framework is as follows.

4. HYPOTHESES

As we have seen, public service motivation may reduce the likelihood of corruption directly and indirectly by moderating other variables' effect.

H1. A Public employee who has higher level of public service motivation will show lower likelihood of corruption.

The existing theoretical literature argues that the level of wage is also important in corrupt behavior: satisfaction with the level of wage can reduce corruption. If we consider public employee's PSM, this can be more complicated because, as we already mentioned, employees who have high levels of PSM are probably less motivated by extrinsic rewards such as wage.

H2. A public employee who is more satisfied with pay will show lower likelihood of corruption

H2-1 A public employee's PSM will moderate the impact of satisfaction for pay on the likelihood of corruption.

Fairness of organization can affect corruption. When an organization is successful in making the member of it feel equally treated, this can decrease the levels of job dissatisfaction, which in turn can decrease the likelihood of corruption. Public employees' PSM can interplay in this process by assisting the organization fairness in reducing the corruption.

H3. A public employee who perceives higher levels of organization fairness will show lower level of likelihood of corruption

H3-1 A public employee's PSM will moderate the impact of fairness of organization on the likelihood of corruption.

As we have seen from previous research, the organizational citizenship behavior is related to civic virtue and altruism. Civic virtue and altruism could reduce the likelihood of corruption.

H4. A Public employee who has higher levels of organizational citizenship behavior will show a lower likelihood of corruption

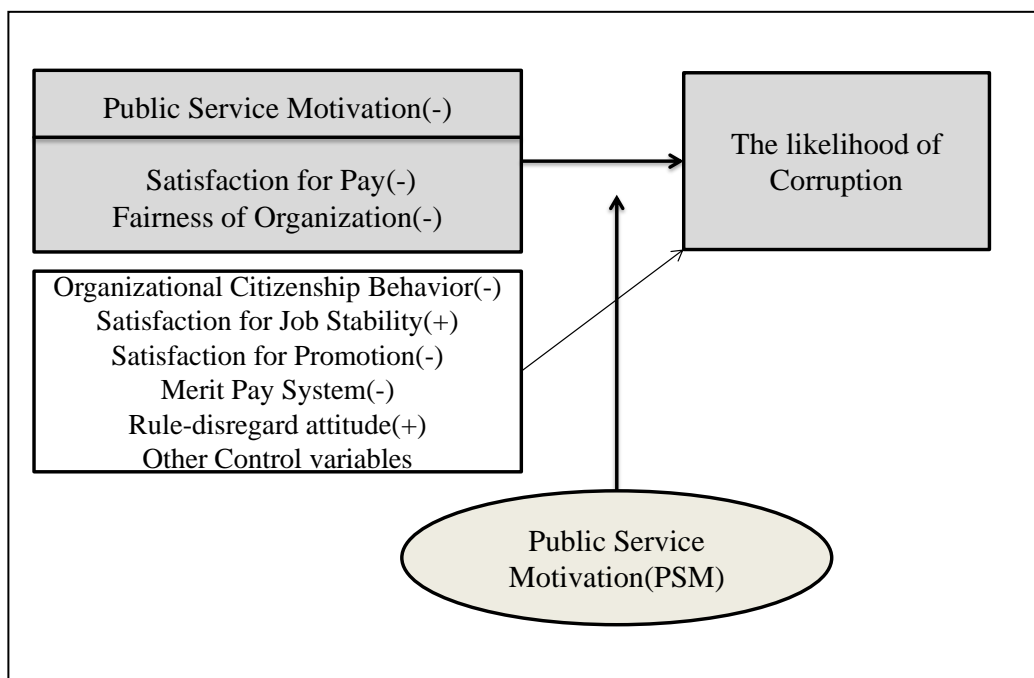
Satisfaction for job stability could have the possibility of having a different effect on the likelihood of corruption. Satisfaction with job stability could reduce the motivation behind

corrupt behavior because the cost of corrupted behavior could be higher than low satisfied person. But someone who satisfied for job stability could also higher the possibility of corrupted because the stability could give bad signal, such as small default could not threat the losing the job so can occurs the likelihood of corruption. Our data is perceived satisfaction for job stability and the real job stability is same as a civil servant. So only the satisfaction for the job stability is perceived concept and then someone who satisfied for job stability probably already got the bad signals and this could increase the likelihood of corruption.

H5. A public employee who more satisfied with job satisfaction will show higher likelihood of corruption

H6. A public employee who perceives higher levels of merit pay system shows lower levels of corruption.

Figure 1] Fairness, PSM, and corruption



III. DATA AND METHODS

1. DATA

This research uses The Korean Civil Service Survey (KCSS) which was conducted by the Knowledge Center for Public Administration & Policy in Seoul National University. The survey was conducted between June 7, 2011 and July 18, 2011 for one thousand three hundred twenty central government officials in forty ministries. Table 1 shows the basic summary of the variables. On average, the likelihood of corruption of Korean civil servants was low at 36.67 and the rule disregard attitude also low as the average was 1.87. Korean public servants exhibit a high-level of public service motivation and organizational citizenship behavior as each averaged 3.512 and 3.533, which is above the midpoint of 3.0. Korean civil servants think organizational fairness is high but exhibit low satisfaction with pay and promotion and the merit pay system. Interestingly, Korean civil servants feel their job as stable, with a score of almost 4.0.

[Table 1] summary statistics

Variable	Mean	Std. Dev.	Min	Max
The likelihood of corruption	36.67116	18.86793	0	100
Public Service Motivation(PSM)	3.512424	0.588412	1	5
PSM(Standardized)	-1.24E-08	4.015710	-17.3787	10.10229
Satisfaction for Pay	2.807430	0.870651	1	5
Fairness of Organization	3.578907	0.839104	1	5
Organizational Citizenship Behavior	3.533586	0.569683	1	5
Satisfaction for Job Stability	3.988636	0.637964	1	5
Satisfaction for Promotion	2.954476	0.819869	1	5
Merit Pay System	2.684091	0.920356	1	5
Rule-disregard attitude	1.875000	0.684705	1	4
Hierarchical rank	4.294697	1.301531	1	7
Female	0.260606	0.439132	0	1
Age	40.41857	7.412849	23	59
Length of service(month)	165.2607	101.8861	1	483

Dependent variable

This study's independent variable is likelihood of corruption. For the corruption measure, objective measures are better than subjective measures, but they also have weaknesses. For example, using the case of 'caught' could depend on monitoring efforts, especially when studied at the individual level. Therefore, this study measured the subjective likelihood of

corruption, but tried to measure subjective likelihood of corruption rigorously. The survey questions used to measure the likelihood of corruption were based on four items; First “Do you think that taking a gift certificate worth 100,000 won¹ (roughly \$100 USD) from job-related companies is corruption?” Second, “Do you think that using long distance call for the private purpose is corruption?” Third, “Do you think that being out of office for the personal task is corruption?” Fourth, “Do you think that taking 100,000 won from job-related companies in your child’s marriage ceremony is corruption?” The officials were asked to respond on a scale of 1 to 5, where 5 represents “It is obvious corruption”, and 1 represents “It is not corruption at all”. This raw value was transferred to the likelihood of corruption. Thus, 5, which represents perceptions of obvious corruption was transferred to zero because the respondents who choose 5 have a very small possibility of corrupt behavior. However, a value of 1, which represents perception of no corruption at all is transferred to 100 because the respondents who choose 5 have high a possibility of corrupt behavior.

Independent/ control variables

Independent variables were public service motivation, satisfaction for pay, fairness of organization, organizational citizenship behavior, satisfaction for job stability, satisfaction for promotion, merit pay system, rule-disregard attitude.

Measuring the moderating variable of PSM, I use Perry (1997)’s measurement. Perry (1997) used 24 items for measuring PSM, but we used 5 items which contains items such as; self-sacrifice, commitment to the public interest, civic duty. The questionnaire was 1) “I am willing to go great lengths to fulfill my obligations to the society” (Civic duty). 2) “I consider public service my civic duty” (commitment to the public interest). 3) “Providing public service is more meaningful than serving myself” (commitment to the public interest). 4) “I am one of those people who would risk personal loss to help someone else” (self-sacrifice). 5) “Making a difference in society means more to me than personal achievements” (self-sacrifice). For analysis, we incorporate with standardized mean

The variable of satisfaction for pay, promotion and job stability was measured by the question “Are you satisfied with your wage (promotion, job stability)?” The officials were asked to answer on a 1 to 5 scale where 5 represents “very satisfied”, and 1 represents “very dissatisfied”.

The variable of fairness of organization was measured by the question “my organization treats all members equally.” Organizational citizenship behavior was measured by three questions “It is frequently the case that I have volunteered work that is not the mandatory work.”, “when I saw colleagues who were suffered from heavy work, I frequently help them.”, “I willingness to work instead of colleagues who left on vacation or leave of absence.”

The merit pay system variable was measured by the question “In my organization, the pay is decided by job performance”. Rule-disregard attitude was measured by question “if it is not revealed, I may ignore the regulation” To these questions, the officials were asked to answer on 1 to 5 scales where 5 represent “I agree absolutely”, and 1 represents “I completely disagree”.

¹ The national service law article 61 states that the public servant shouldn’t give or take reward money from job-related companies. The public servant code of conduct 12 clause limit a gift certificate couldn’t over 30,000 won and 15 clause limits that public servant couldn’t get over the 50,000 won at the child marriage ceremony.

Demographic characteristics may influence the likelihood of corruption. For controlling the effect of spurious statistical influence, demographic control variables were measured: Hierarchical rank, sex, age, Length of service. Length of service was measured by asking employees their working period (month) at the public office.

2. METHODS

For the purposes of testing the main and interaction effects of PSM and Independent variables, I utilized a series of hierarchical regressions. When using the multiplicative term, one must deal with the multicollinearity problem which yields unreliable and unstable coefficients. To solve this problem, a great deal of research (e.g., Cohen and Cohen 1983; Aiken and West 1991; Simons and Peterson 2000) has used a hierarchical regression procedure. In my model, the independent variables are not highly correlated, but I used hierarchical regression model for seeking accurate estimation. First respondents' demographic variables (Hierarchical rank, sex, age, length of service) were entered in step one as controls. Second model included independent variables such as public service motivation and satisfaction for pay and others. Third model entered interaction term with public service motivation and satisfaction for pay (and fairness of organization). To verify graphically, we divided PSM into high, middle, and low PSM groups². After regression analysis, we create graphs of predicted values (holding all other variables constant at the mean, except targeted independent variable) which separated lines according to the PSM groups.

IV. RESULTS

Table 3 describes the results of the regression analyses of PSM and Corruption. The first model (Model1) assessed the effects of control variables on the likelihood of corruption. The second model (Model 2) assessed the effects of the independent variables on the likelihood of corruption. The third model (Model 3) assessed the effect of the moderating variables (PSM) on the relationship between the satisfaction for pay (fairness of organization) and the likelihood of corruption. To test the moderating effect, the F-test of R2 change was conducted. The table 2 shows that R2 change was statistically significant at 95% significant level.

[Table 2] the result of F-test

	Dependent Variable(likelihood of corruption)					
	R2	F(df)	p	R2 change	F(df) change	p
Model1	0.008	2.591(4,1279)	0.035			
Model2	0.128	15.529(12,1268)	0.000	0.12	21.832(8,1268)	0.000
Model3	0.134	14.039(14,1266)	0.000	0.006	4.578(2,1266)	0.010

² To make three category of PSM, we used the standardized of PSM scores. Because the same observations are lot, so we couldn't divide exactly 33.3% each group. As a result the each groups' percent are little bit different. Low PSM group is 426(32.27%), Middle PSM group is 478(36.21%), and High PSM group is 416(31.52%).

1. THE CAUSES OF CORRUPTION

Public service motivation has a highly significant and negative relationship with the likelihood of corruption (-0.590, $p < 0.01$). That means public servants who have high levels of PSM are less likely to be corrupt. The satisfaction with pay was also negatively related to the likelihood of corruption (-1.864, $p < 0.05$). Fairness of organization was negatively associated with the likelihood of corruption (-1.332, $p < 0.1$). Public servants who think their organization is fair are less likely to be corrupt. With these results, the major hypothesis 1, 2, 3 are accepted.

The organizational citizenship behavior has highly significant and negative relationship with the likelihood of corruption (-3.678, $p < 0.01$). Merit pay system has a significant and negative effect to the likelihood of corruption as same with our hypothesis. The satisfaction with job stability and rule-disregard attitude was negative relationship with the likelihood of corruption. But satisfaction for promotion was not statistically significant.

Among the control variables, sex has highly significant effect. Similar to previous research females are less likely to be corrupt than males.

[Table 3] Predicting the likelihood of corruption

	Model 1 (β)	Model 2 (β)	Model 3 (β)
Hierarchical rank	0.082 (0.473)	0.154 (0.462)	0.150 (0.461)
Female	-2.449* (1.3330)	-4.617*** (1.276)	-4.615*** (1.273)
Age	-0.398** (0.165)	-0.246 (0.157)	-0.244 (0.157)
Length of service(month)	0.014 (0.011)	0.017* (0.011)	0.017 (0.011)
Public Service Motivation(PSM)		-0.590*** (0.157)	-0.222 (0.519)
Satisfaction for Pay		-1.864** (0.762)	-1.832** (0.764)
Fairness of Organization		-1.332* (0.680)	-1.418** (0.679)
Organizational Citizenship Behavior		-3.678*** (1.036)	-3.735*** (1.036)
Satisfaction for Job Stability		2.212** (0.864)	2.195** (0.862)
Satisfaction for Promotion		0.131 (0.825)	-0.092 (0.827)
Merit Pay System		-1.514*** (0.585)	-1.454** (0.584)
Rule-disregard attitude		5.007*** (0.774)	4.886*** (0.773)
PSM*Satisfaction for Pay			0.331** (0.138)
PSM*Fairness of Organization			-0.360*** (0.138)

Intercept	50.781*** (5.038)	52.750*** (7.435)	54.051*** (7.440)
F-value	2.59	15.53	14.04
Adj R-squared	0.005	0.119	0.125
N	1284	1281	1281

note: Standard errors are in parentheses, *** p<0.01, ** p<0.05, * p<0.1

2. THE MODERATING EFFECTS OF PSM

The moderating effect of PSM was highly significant with respect to the relationship between satisfaction for pay and the likelihood of corruption. The moderating effect of PSM, however, was inconsistent with respect to the relationship between satisfaction for pay and the likelihood of corruption. Satisfaction for pay was negatively related to likelihood of corruption (-1.832, p<0.05), but the interaction term of Satisfaction for pay and PSM was positively related to the likelihood of corruption (0.331, p<0.05). In model2, the reducing effect of satisfaction for pay on the likelihood of corruption is -1.864. But in model3, the reducing effect of satisfaction for pay is $-1.832 + 0.3331\text{PSM}$, suggesting that higher PSM levels will diminish the reducing effect of satisfaction for pay on the likelihood of corruption. The reducing effect of satisfaction for pay on the likelihood of corruption was stronger for those who have lower levels of PSM than higher levels of PSM. So, hypothesis 2-1 was accepted.

The moderating effect of PSM was also highly significant with respect to the relationship between fairness of organization and the likelihood of corruption. Fairness of organization affects the likelihood of corruption differently according to the level of PSM. The interaction term of organizational fairness and PSM was negatively related to the likelihood of corruption (-0.360, p<0.01). In the model2, the reducing effect of fairness of organization on the likelihood of corruption is -1.332, but in the model3, the reducing effect is $-1.418 - 0.360\text{PSM}$, so higher PSM levels will increase the effect of fairness of organization on the likelihood of corruption. The effect of satisfaction for pay and fairness of organization on the likelihood of corruption depends on the PSM level. That means the effect of organizational fairness in reducing the likelihood of corruption was stronger for those who have the higher levels of PSM than low level of PSM.

Figures 1 and 2 show the moderating effect of PSM. So the hypothesis 2-1 and 3-1 was accepted.

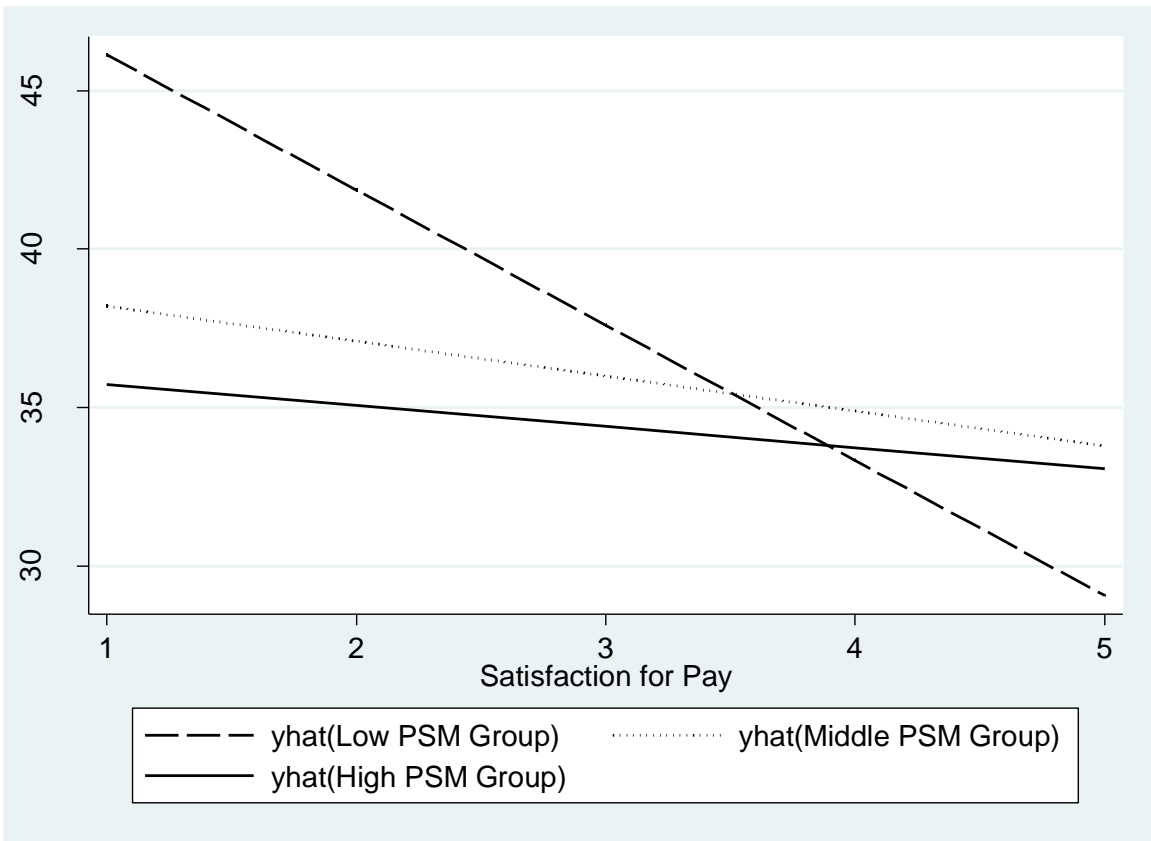
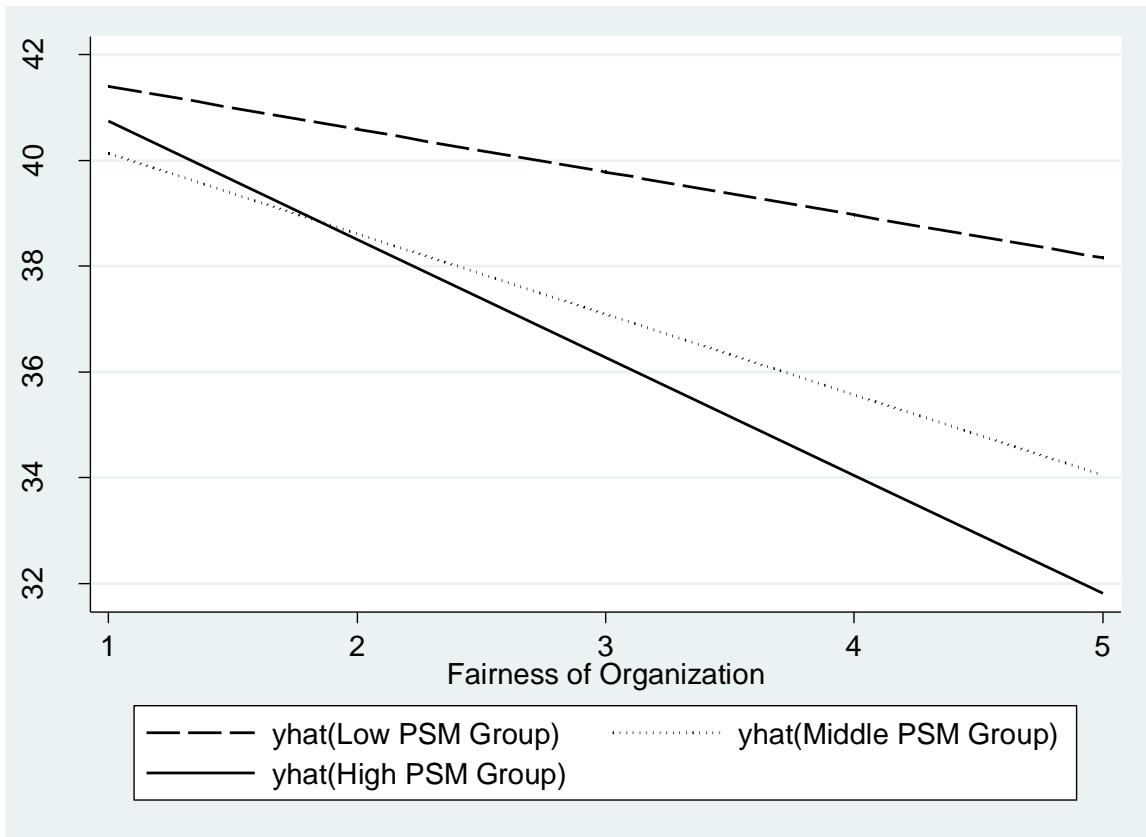


Figure1. The interaction effect of PSM and satisfaction for pay on the likelihood of corruption.

As we can see from figure1, the low PSM group has a higher slope than other groups. That means the relationship between satisfaction for pay and the likelihood of corruption was moderated by PSM. The low levels of PSM has a more reducing effect on satisfaction of pay on the likelihood of corruption than middle and high level of PSM group.

In the figure1, the high PSM group has a steeper slope than other groups. Organizational fairness lowers the likelihood of corruption and this effect is stronger on high PSM groups than middle and low PSM group.



V. DISCUSSION

Adams's theory of equity explained that people not only pay attention to the ratio of input/output but also pay attention to the relative equity compared to other person. The people who think they are treated unfairly are likely to reduce their effort. However, more active people will try to make up the gap through the illegal behavior such as corruption. The results of empirical test support this hypothesis.

Organizational fairness is important in reducing levels of corruption and this fairness is more important to the people who have high levels of PSM. The public servants who have high levels of PSM have, by consequence high levels of commitment to the public interest and civic duty. Public interest and civic duty are highly related to fair treatment among the organization members and community members. Organizational fairness can reduce the likelihood of corruption, because fair treatment is more important to reduce corruption among the public servants who have high level of PSM because they are more sensitive to fairness.

Satisfaction with pay can reduce the likelihood of corruption therefore, reasonable payment is important for reducing corruption. Even though satisfaction with pay can reduce the likelihood of corruption, the effect was moderated by PSM. Anti-corruption effect of pay is stronger for those who have low level of PSM than those who have high level of PSM. So pay increases cannot be seen as a panacea in reducing corruption, especially for those who have high levels of PSM. Fair treatment is more effective method than increasing pay to reduce corruption for who have high level of PSM.

Public service motivation does not only have moderating effect on reducing corruption but also a direct effect. Almost previous research has focused on the relationship between PSM

and Performance and neglected the relationship between PSM and corruption. The contribution of this research is that it is the first to empirically test this relationship. And we anticipate the more empirical researches will be produced.

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Appendix

	1	2	3	4	5	6	7	8	9	10	11	12	13
Corruption(1)	1												
PSM(standardized)(2)	-0.2396***	1											
Satisfaction for pay(3)	-0.1373***	0.2405***	1										
Fairness of organization(4)	-0.1715***	0.3356***	0.2459***	1									
Organizational citizenship behavior(5)	-0.2240***	0.4941***	0.1511***	0.2852***	1								
Satisfaction for job stability(6)	-0.0657**	0.2941***	0.1721***	0.2813***	0.3101***	1							
Satisfaction for promotion(7)	-0.1245***	0.2249***	0.6087***	0.3592***	0.1783***	0.2080***	1						
Merit pay system(8)	-0.1417***	0.2484***	0.2110***	0.2004***	0.1863***	0.0714***	0.2858***	1					
Rule-disregard attitude(9)	0.2333***	-0.2622***	0.0107	-0.2061***	-0.2448***	-0.2324***	-0.0493*	-0.0507*	1				
Hierarchical rank(10)	-0.0250	0.1761***	0.0667**	0.0210	0.0202	-0.0069	0.1524***	0.2177***	-0.0454*	1			
Female(11)	-0.0187	-0.2435***	-0.0352	-0.1136***	-0.1471***	-0.0544**	-0.0492*	-0.1488***	0.0731***	-0.3056***	1		
Age(12)	-0.0693**	0.2856***	0.2242***	0.0800***	0.1274***	0.0157	0.079***	0.129***	-0.083***	0.479***	-0.364***	1	
Length of service(month)(13)	-0.0488*	0.2482***	0.2505***	0.0710**	0.1151***	0.0469*	0.071**	0.087***	-0.068**	0.365***	-0.230***	0.8778***	1

*p<0.1, **p<0.05, ***p<0.01