

# Antecedents of Job Satisfaction among academic staff at a Saudi Government University: Using partial square

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**Abstract** - The study at hand explores the antecedents of job satisfaction that affect the degree of job satisfaction experienced by academic staff within a government university in Saudi Arabia. This research centers on the nascent University of Tabuk and endeavors to make a contribution that could provide significance to the body of research, especially in the Middle East. The sample of this study consists of 284 academic contractors at the university under study, namely Tabuk University. Smart-PLS Software analyzed the data, and the study revealed that work environment, administrative process, financial incentive and performance appraisal closely interlink with job satisfaction at Tabuk University, with scientific research and publication having little relation to the predictors of JS.

**Keywords** -Job satisfaction; work environment; administrative process; financial incentive; performance appraisal and Research

## 1. INTRODUCTION

Within higher education institutions such as universities, academic staff constitutes key assets, in that they produce and deliver knowledge. For initiation to meet the requirements of this section of the university's task force, managers must promote job satisfaction among their staff. This, in turn, creates a positive impact on staff. Job satisfaction, albeit, can never be measured with precision. Job satisfaction has been studied extensively due to its importance to the work environment, the well-being of employees, and job productivity. In support of this view, Machado-Taylor (2010)[28] stated that motivation and job satisfaction among academic staff play a great role in influencing the quality of the outcome of student learning and institution. To this effect, staff satisfaction more likely helps universities achieve their goals in the fields of teaching and research. Job satisfaction is complicated for management and managers, as it relates to employees and their attitude. Job satisfaction gains even more prominence, with the knowledge that it embodies motivation, and reflects on employees' productivities. The merging of these components ultimately contributes to the overall performance of organizations. In the field of organizational behavior, job satisfaction occupies the top position in that organizational behaviorism studies employees' attitude. Herein, the chief focus centers on determining employees' perceptions towards their jobs and how the latter provides them with a concept of what

they perceive as important. In the context of Saudi Arabia, rare studies have been conducted to explore the nature of academic staff satisfaction. This timely research examines the job satisfaction of academic staff at the University of Tabuk and tries to take the lead in this area of studies.

By the same token, studies that explore factors that contribute to an increase JS in Saudi Arabia, particularly in the public sector and among academic staff, remain a rarity as we speak. The academic neglect of this area acted as a spur in my decision to find out the level of job satisfaction and the factors that influence JS. I trust my study will plug this academic hole and cause more research on the case.

This research seeks to explore job satisfaction among academic staff at the University of Tabuk, and its objectives are as follows:

1. To investigate the relationship between work environment, administrative process, financial incentive, performance appraisal, and Research with job satisfaction. The structure of this research starts with a review, in the first section, of previous studies that focus on academic staff. The next section lays out the methodology and outlines the method used in this research. The penultimate section covers sampling and procedure, results and discussion. The final section covers the conclusion and highlights recommendations for further studies.

Table (1) Research Hypothesis

Hypothesis		Reference
Work Environment	→ Job Satisfaction	Flowers and Hughes 1973. Lacy and Sheehan 1997
Administrative Process	→ Job Satisfaction	Lacy and Sheehan 1997
Financial Incentive	→ Job Satisfaction	Alakash and Alhusain 2008
Performance Appraisal	→ Job Satisfaction	Absar et al. 2010

Research	Job Satisfaction	Lacy and Sheehan 1997
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## 2. LITERATURE REVIEW

Even though much research and studies have been conducted in the field of Job Satisfaction (JS), no general agreement regarding its definition has been reached. The reason for such a deadlock resides in how researchers use a linear presentation to conduct their research. For instance, when they conduct research on a given organization, they simply categorize employees under the linear, simplistic presentation, satisfied, neutral and the rest dissatisfied. This linear approach to research prevented consensus among researchers and scholars on how to accurately define JS. Different models and theoretical approaches to JS have discussed various aspects of job satisfaction (George and Jones, 2012)[14]. In addition, JS has also been studied within different disciplines, such as management, economics, sociology and psychology (Alshamrani, 2017)[2].

The importance of JS resides in its potential, which affects a wide range of behavior and attitudes in organizations, which in turn contributes to employees' level of well-being. Studies such as Aslan et al. (2013)[4], Said-ud-Din et al. (2010)[31] and Saari and Judge (2004)[30], indicate that JS positively influences employees' attitude. One might argue that JS reflects how the employees feel regarding their job. What stands out thus pertains to something internal, personal to employees JS, in relation to some factors inherent to the job they perform and which causes them to feel either satisfied or dissatisfied. The implications of these feelings, in turn, represent the extent to which employees like or dislike their job. Adding thrust to the above, Hoppock (1935)[23], cited in Aziri (2011)[5], defined job satisfaction as "any combination of psychological, physiological and environmental circumstance that causes a person truthfully to say I am satisfied with my job" (p.77). JS represents the state in which tangible award meets or matches employees' expectation, where happiness and enthusiasm reflect employee performance and imply JS. George and Jones (2012) [14] indicated that

employees always have an attitude regarding various aspects of their jobs such as their pay, subordinate or supervisors, and the kind of job or tasks they do, and this satisfaction can fluctuate from extremely positive to extremely negative. Where George and Jones (2012)[14] defined JS as "the collection of feelings and beliefs that people have about their jobs" (p. 75), Locke (1976), for his part, proposed a comprehensive definition for JS, "A pleasurable or positive emotional state resulting from the appraisal of one's job or job experience" (p. 1300)

The determinants of JS George and Jones (2012)[14] indicated that four factors influence the level of JS. First, personality which centers on how employees feel or think about their jobs, and where an individual's personality determines his level of feelings and shapes his perceptions of his job. These feelings and perceptions fluctuate from extremely positive to extremely negative. Second, values which center on the employees' convictions about their attitude toward their duties, and the outcome of their approach to work. Third, but most important, we have the work situation. This component acts as a determinant source of JS. It relates to how organizations employ their task force, the nature of the tasks workers must perform, and the modus-operandi of the organization, and extends to whether employees perform a task they perceive as either interesting or boring. It relates too to the level of interaction employees have with their subordinates, customers and managers, to how the organization treats them in matters such as salary, job security, benefits, perks and the work conditions at the workplace, namely the temperature, noise, and crowdedness. Finally, the fourth determinant of JS relates to social influence, which is about the degree of collegiality among co-worker, whether the organization provides a culture of collegiality, and how much of it exists on the work floor. Herzberg's theory of what amounts to job satisfaction and dissatisfaction stands as the most cited of all definitions. The key JS factors that were highlighted by Herzberg's theory are shown below in table (2).

Table (2) Motivation-Hygiene theory

Motivational factors, Intrinsic (actual work content)	Hygiene factors, Extrinsic (work context)
	Salary
Achievement	Work condition
Recognition	Supervisor's practice
Responsibility	Staff assessment
Advancement	Benefits
Growth	Work relation
Promotion	Job security

The motivation factor proposed by Herzberg (1968) has been studied by several researchers in relation to JS. Some of the studies have concluded with a similar result as Herzberg, while others came up with different conclusions. Findings from the studies of Hill (1986)[22] and Halsey (1992)[18] stressed that intrinsic motivation factors are related and critical to JS while extrinsic factors

are not. Hill also concluded that while the JS of academic staff at colleges and universities was related to intrinsic factors, job dissatisfaction was related to extrinsic factors. These emanate from factors that are external to the job. Pearson and Seiler (1983)[29] used Herzberg's theory to investigate the level of satisfaction with the working environment among the faculty. The findings of the study

showed that faculties members were, in general, more satisfied than dissatisfied with intrinsic factors such as the environment. By contrast, their level of dissatisfaction with extrinsic factors such as salary was high. Manger and Eikeland (1990) examined the factors related to the intention of faculty members to leave their job. The findings support the view that the environment such as organizational culture and work atmosphere largely determine the employees' feelings of satisfaction with their job. Whiles other studies, like those of Tytherleigh et al. (2005)[37] and Gillespie et al. (2001)[15] found that intrinsics and other factors such as resources, rewards, security, workload and recognitions constitute critical components of JS. Breaking away from the differences cited above, a recent study by Nabila (2017) indicated that, based on two factors JS widely varies between countries. She cited, first, external factors among which are unemployment rate and the average of wages in the private and public sectors. She then highlighted the second factor as pertaining to internal components among which are the work environment in the organization and the challenges that face employees inside the workplace. These two factors affect people in their job, which in turn, makes them either satisfied or dissatisfied. A (2014) study indicated that because of the varied level of managerial reforms between contexts, the degree of job satisfaction and job stress differ across countries. Herzberg, cited in Lacy et al. (1997)[25], stated "that satisfaction and dissatisfaction are not on the same continuum" (p. 307). He also argued that intrinsic factors can cause satisfaction or dissatisfaction, whereas the absence of extrinsic factors cause dissatisfaction and when it exists (extrinsic factors) no dissatisfaction can be observed. Concerning the academic environment, many studies like those of Houston et al. (2006)[24] and Bryson (2004)[9] have concluded that both factors are important to JS instead of saying there are clear distinctions between extrinsic and intrinsic factors. Subsequently, Bussing et al. (1999)[10] indicated that theoretical analyses of job satisfaction have been criticized for being too conceptually narrow. The study highlights the following three dimensions as the causes of the shortcomings. First, JS is about emotional response by people to their job situation, meaning it cannot be seen but it can be inferred. Second, sometimes JS is determined through outcomes and expectations, specifically in how outcomes meet or exceed expectations. Third, JS represents several interlinked attitudes such as work life, pay, promotion opportunities, supervision and collegiality between co-workers. Lacy et al. (1997)[25] observed that, regardless, morale commitment of academic staff is still "lauded as being high" (p. 306). Hezberg et al. (1959)[21] noted that JS is not a unidimensional concept where job-related variables contributing to JS are separate from those variables contributing to job dissatisfaction.

### 3. METHODOLOGY

This study investigates the relationship between the work environment, administrative process, financial incentive, performance appraisal, and research on job satisfaction among academic staff at a public university in Saudi Arabia. Researchers like George and Jones (2012)[14] Aziri (2011)[5] Rue and Byaes (2003) have established that job satisfaction had multi-faceted factors that can influence a lack of consensus regarding this issue. Differences thus arise because measuring JS constitutes a global issue and several methods used by researchers and several surveys fill the scholarly shelves, ready for use. This research examines JS using factors of Job Description Index for measuring JS and for appropriateness within an academic context at the University of Tabuk. The factors used relate to the elements of satisfaction or dissatisfaction. To that effect, Bentley et al. (2013)[7] indicated that all academic staff around the world engage in similar activities. In the order of face validity, the dimensions of the study and its items have been distributed to four professors in the field of management for their comments on the design. Twenty-nine items were used to measure JS within five factors or dimensions, of which work environment has 9 items, administrative process has 4 items, compensation and benefits has 5 items, scientific research has 5 items, and finally performance appraisal has 6 items. The items used on each dimension of the questionnaire were selected based on a literature review to cover all issues related to the dimension. The population of the study consisted of the academic staff at the University of Tabuk, where 350 questionnaires were randomly distributed with 284 returned.

#### 3.1 Analysis

The smart-PLS 2.0 version was used to analyze the data using the structural equation modeling (SEM). Smart-PLS can evaluate the model and test hypotheses simultaneously (Schreiber, Nora et al. 2006). SEM can be broken into two main models: the measurement model and the structural model. The measurement model determines the extent to which the items belong to their latent construct. This method indicates the way to conduct confirmatory factor analysis (CFA). Outer model involves testing the individual indicators, reliabilities convergence, average variance extracted (AVE) and discriminant validities (Chin, 2010)[11]. The structural model shows the relationship between latent constructs (Brown, 2006)[8].  $R^2$  change was considered to test the model fit of the model (Chin, 2010).

### 4. VALIDATION PROCESS OF THE MODEL

I used two methods to evaluate Construct Validity: convergent and discriminant validities. Convergent validity relates to the degree to which multiple methods of measuring a factor present the same results; the factor



loading must be higher than the items' factor loading of other constructs. The factor loading is considered of more than 0.6. Composite reliability and Cronbach Alpha should be more than 0.7 and, finally, the value of AVE should be more than 0.50. Factor Loadings of 0.6 are considered acceptable. Discriminant validity ensures that each latent construct shares more variance with its own block of indicators than with any other latent construct ( $\sqrt{AVE} \geq 0.5$ ). (Chin, 2010; Hair, Ringle et al., 2011). Path estimation ( $\beta$ ) value was considered based on the results of  $t$  value ( $p \leq 0.05$ ) (Henseler et al., 2009)[20].

## 5. RESULTS AND DISCUSSION

### 5.1 Demographic Factors

Table 3 presents the demographic factors. Two hundred and eighty-four participants (197 male and 87 female) were involved in this study with different grades; most of them were assistant professors (162), with 52 associate professors, 43 professors and 43 lecturers. Of all the participants, only 66 had work experience exceeding 6 years, 111 were in 1–3 years category, while 107 had experience between 4 and 6 years. Two hundred and eighty staff currently work at Tabuk University and only 4 have since left the University.

Table 3. Demographic factors (N=284)

	Item	N	%
Gender	Male	197	69.4
	Female	87	30.6
Grade	Professor	27	9.5
	Asso. /Prof.	52	18.3
	Assis. /prof.	162	57.0
	Lecturer	43	15.1
Work experience	1–3 years	111	39.1
	4–6 years	107	37.7
	More than 6 years	66	23.2
Still working at Tabuk University	Current employees	280	98.6
	Past employees	4	1.4

### 5.2 Model Evaluation

The development of the current study rests on the theoretical background with five independent constructs and one dependent construct. The  $R^2$  achieved acceptable results with 0.49. However, items were eliminated from the model as the low value of factor loadings. Table 4 and Figures 1 and 2 Env4, Env8, Fince2, PA5, Rech3 show the eliminated. Composite reliability and Cronbach alpha ranged between 0.83 and 1.00, which exceeded the minimum value of 0.7. AVE values were ranged between

0.51 and 1.00, which exceeded the cut off value of 0.5, and the lowest value of  $\sqrt{AVE}$ , which is 0.71, exceeded the highest correlation of 0.69. These results approved the discriminant validity of the model. As hypothesized by the model the conducts should be correlated positively. To that end, table (4?) shows a strongly significant and positive correlation between constructs. These ranged between .48 and .69, with the results approved the nomological validity (see table 4).

Table 4. Factor loading (N=284)

	Env	Fince	PA	Proc	Rech	Sat
Env1	0.77	0.52	0.56	0.68	0.49	0.62
Env2	0.73	0.23	0.38	0.41	0.18	0.32
Env3	0.75	0.30	0.45	0.45	0.23	0.39
Env5	0.77	0.30	0.51	0.49	0.28	0.39
Env6	0.68	0.23	0.39	0.38	0.18	0.37

Env7	0.68	0.18	0.43	0.35	0.17	0.27
Env9	0.63	0.46	0.45	0.54	0.58	0.36
Fince1	0.39	0.79	0.47	0.58	0.50	0.48
Fince3	0.33	0.80	0.48	0.52	0.56	0.35
Fince4	0.40	0.85	0.46	0.57	0.52	0.42
Fince5	0.41	0.81	0.49	0.57	0.45	0.51
PA1	0.60	0.40	0.83	0.55	0.36	0.47
PA2	0.50	0.45	0.84	0.55	0.39	0.39
PA3	0.44	0.51	0.72	0.54	0.46	0.46
PA4	0.55	0.50	0.84	0.59	0.42	0.51
PA6	0.52	0.50	0.82	0.56	0.43	0.50
Proc1	0.60	0.58	0.60	0.88	0.54	0.53
Proc2	0.62	0.63	0.63	0.90	0.59	0.64
Proc3	0.57	0.60	0.53	0.85	0.58	0.58
Proc4	0.58	0.56	0.62	0.81	0.43	0.52
Rech1	0.46	0.57	0.45	0.59	0.87	0.45
Rech2	0.35	0.54	0.46	0.55	0.87	0.40
Rech4	0.39	0.53	0.45	0.54	0.87	0.44
Rech5	0.34	0.48	0.40	0.45	0.82	0.38
Sat	0.58	0.55	0.58	0.66	0.49	1.00

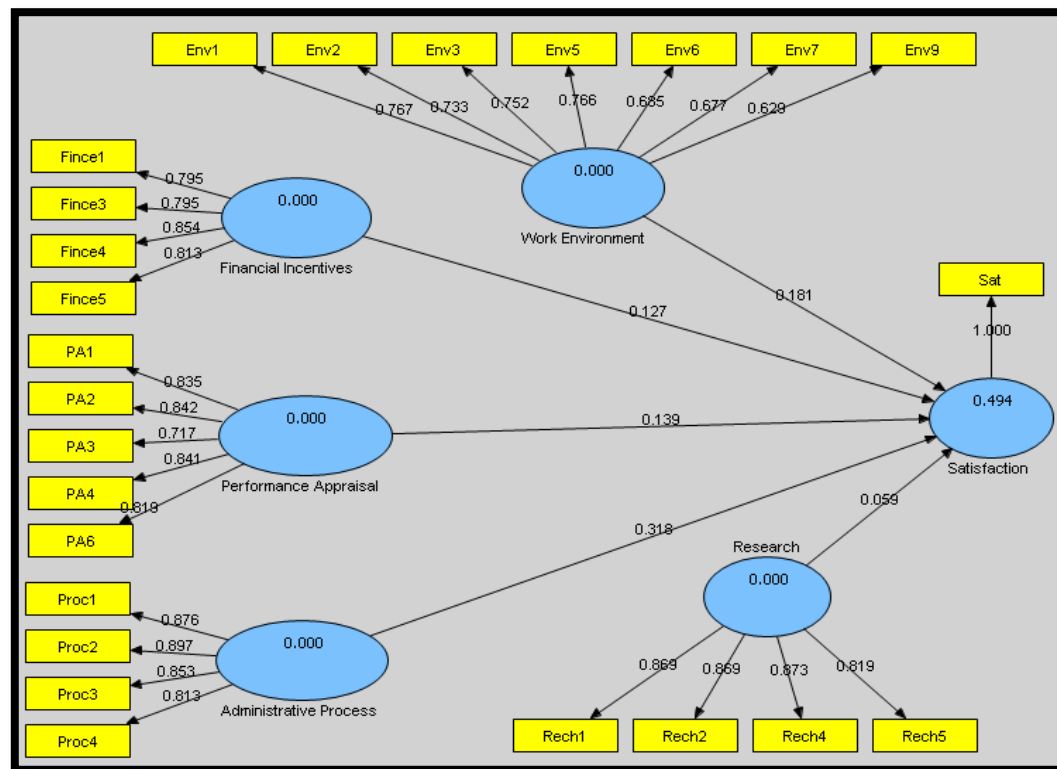


Figure 1. Factor loading,  $\beta$  value and  $R^2$  (N=284)

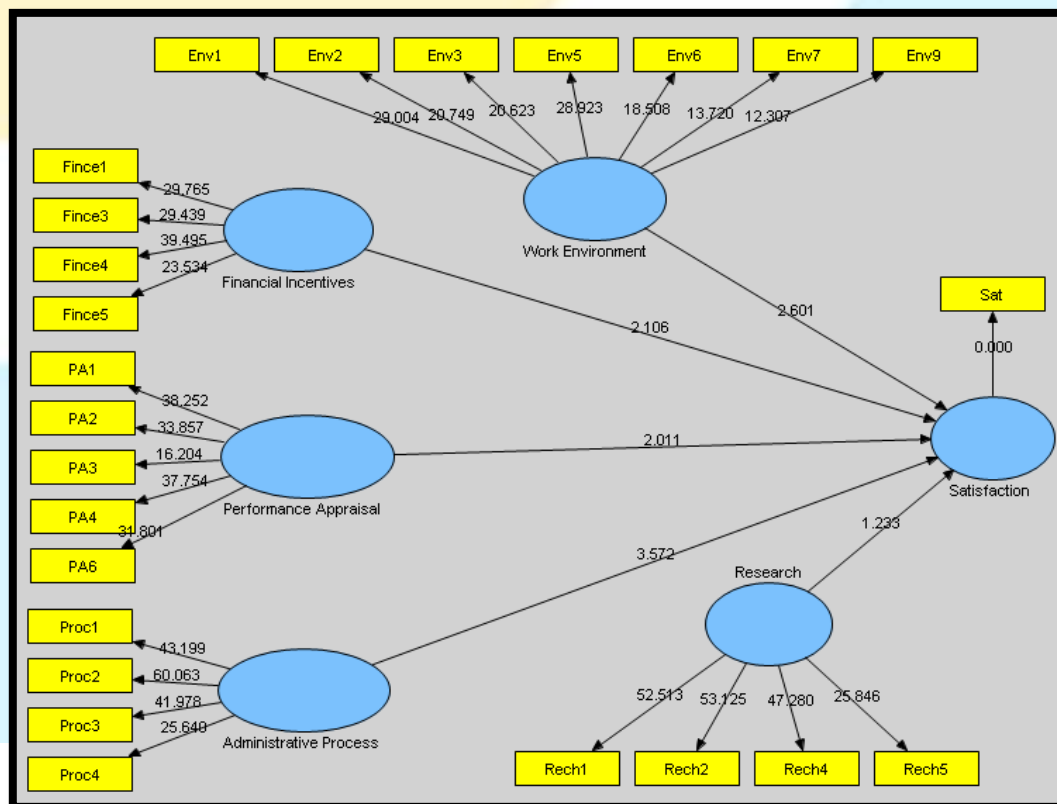


Figure 2.  $t$ -value (N=284)

Table 5.  $\sqrt{\text{AVE}}$ , AVE, Composite Reliability,  $\alpha$ ,  $R^2$  and correlation between constructs (N=284)

	$\sqrt{\text{AVE}}$	AVE	Composite Reliability	$\alpha$	$R^2$	Env	Fince	PA	Proc	Rech	Sat
Env	0.71	0.51	0.84	0.83	0.00	1.00					
Fince	0.80	0.65	0.89	0.83	0.00	0.48	1.00				
PA	0.81	0.66	0.91	0.87	0.00	0.64	0.58	1.00			
Proc	0.85	0.73	0.91	0.85	0.00	0.69	0.69	0.69	1.00		
Rech	0.86	0.74	0.92	0.88	0.00	0.45	0.62	0.51	0.63	1.00	
Sat	1.00	1.00	1.00	1.00	0.49	0.58	0.55	0.58	0.66	0.49	1.00
Correlation is significant at the 0.01 level (2-tailed)											
Keys: Work environment (Env.), Administrative Process (Proc.), Financial Incentives (Fince), Research (Rech), Performance Appraisal (PA), Satisfaction (Sat)											

Table 6. The relationship between constructs ( N=284)

Relationship	$\beta$	T	Remarks
Env ► Sat	0.18	2.6	*
Fince ► Sat	0.13	2.12	*
PA ► Sat	0.14	2.01	*
Proc ► Sat	0.32	3.57	*
Rech ► Sat	0.06	1.23	NS
Keys: $\beta$ =Coefficient path.SE=standard error. T=T-statistic			
* $p \leq 0.05$			
Keys: Work environment (Env.), Administrative Process (Proc.), Financial Incentives (Fince), Research (Rech), Performance Appraisal (PA), Satisfaction (Sat)			

### 5.3 Construct Relationship Results

Table 6 presents the results of the relationship between constructs as follows:

#### 5.3.1 Work environment (Env) and Satisfaction (Sat)

The result of the structural equation modeling indicates that the structural path between Env. and Sat. was positive and significant ( $\beta=0.18$   $t=2.6$ ,  $p \leq 0.05$ ). This indicates that there is a strong relationship between constructs. Env. was found to be a perfect predictor and antecedent for increasing satisfaction.

#### 5.3.2 Administrative Process (Proc.) and Satisfaction (Sat.)

The result of the structural equation modeling indicates that the structural path between Proc. and Sat. was positive and significant ( $\beta=0.32$   $t=3.57$ ,  $p \leq 0.05$ ). This indicates that there is a strong relationship between constructs. Proc. was found to be a perfect predictor and antecedent for increasing satisfaction.

#### 5.3.3 Financial Incentives (Fince.) and Satisfaction (Sat.)

The result of the structural equation modeling indicates that the structural path between Fince. and Sat. was positive and significant ( $\beta=0.13$   $t=2.12$ ,  $p \leq 0.05$ ). This indicates that there is a strong relationship between constructs. Fince. was found to be a perfect predictor and antecedent for increasing satisfaction.

#### 5.3.4 Performance Appraisal (PA.) and Satisfaction (Sat.)

The result of the structural equation modeling indicates that the structural path between PA and Sat was positive and significant ( $\beta=2.01$   $t=0.14$ ,  $p \leq 0.05$ ). This indicates that there is a strong relationship between constructs. PA was found to be a perfect predictor and antecedent for increasing satisfaction.

#### 5.3.5 Research (Resch.) and Satisfaction (Sat.)

The result of the structural equation modeling indicates that the structural path between Resch. and Sat. was positive but insignificant ( $\beta=0.06$   $t=1.23$ ,  $p \geq 0.05$ ). This indicates that there is NO relationship between constructs. Resch. was not found to be a perfect predictor and antecedent for increasing satisfaction.

## 6. DISCUSSION

The study explores JS antecedents that influence academic staff. Literature review has listed a series of influences on JS, which may have roots in an employee's earlier life, and which in turn may influence her level of loyalty, absenteeism, productivity, and overall originations improvement. Rewards of which salary, compensation, benefits and perks, in general, constitute the most important factor for employees. As reported by Tang et al. (2004)[35] and Tan and Amna (2011)[34], when employees receive these rewards, they feel equal to higher management, which contributes to satisfaction with their jobs. From job satisfaction snowballs greater

employee effort and productivity. Recent research has established that satisfaction not only contributes to improving the performance of individuals but that it also helps in improving departments and organizations as a whole. As shown, in the previous section, the hypotheses of this study have been tested, showing the relationship between study factors and JS. The first dimension indicates that the work environment was accepted as a strong and significant factor, with a notable contribution and impact on job satisfaction. Our view and findings tally with those of Flowers and Hughes (1973)[13], as well as Lacy and Sheehan (1997)[25], who support hygiene factors and environment in general, as notable contributors to the quality of job satisfaction. The second accepted hypothesis shows that the administrative process has a significant relationship with JS, as per Lacy and Sheehan's (1997)[25] findings, implying that the managerial process can, passively or negatively, contribute to JS. The third hypothesis relates to financial incentives of which salary was accepted as a predictor of JS. This view and findings too tally with those of previous studies such as Gillespie et al. (2001)[15] and Egbule (2003)[12]. Another study has discerned that, for academic staff, payment affects JS. It is worth noting that for Terpstra and Honoree (2004)[36] this finding ranks low in JS with Malaysian academic staff (Faculty?). This inconsistency forms the core of Amzat and Idris's (2012)[3] study, which reveal that salary constitutes a smaller predictor and act as a secondary factor for job satisfaction. The fourth hypothesis brings to the fore the issue of performance appraisal as predictors of JS. Our view and findings tally with those of Absar et al. (2010)[1]. The last hypothesis, which focused on scientific research and its relation to JS was rejected, implying that, for academic staff (faculty), being ranked low is a predictor and factor of job satisfaction.

In conclusion, the findings of this study reveal that Herzberg's Hygiene factors act as reliable predictors with significant links to academic staff job satisfaction at Tabuk University. These findings highlight the existence of some form of consensus and of shared perspectives between academic staff in relation to the four dimensions, which strongly impact on JS. The study of Hashim and Mahmood (2011)[19] in Malaysian universities reveals inconsistencies with this study. The authors found that hygienic factors constituted the lowest factor in JS. On another side of the fence, findings by Sirin (2009)[33] revealed that employers utilized the motivation factor to increase JS and maintain a good work atmosphere and a pleasant environment in the workplace.

## 7. CONCLUSION

This study, conducted on academic staff at a public university, within the context of Saudi Arabia, stands as a pioneer in the field and is one of a kind. As shown in previous sections, different findings are presented in different contexts or countries. Studies may also focus on

different cultures or distinct occupational aspects as per the nature of each research. Our work designs a measurement of job satisfaction from past research and literature to fit the context in which the research is carried out. The findings of this empirical study provide partial support to Herzberg's theory. They encourage other researchers to test this scale on a wide range of universities or compare private universities with public ones. Our findings also recommend face-to-face interviews to allow the participant time and space to elaborate on their perception of what in their eyes constitutes tangible JS. This study, which treats factors that directly relate to the core of academic staff's profession, provides, herein, an opportunity and an open call for academics to develop robust, reliable and valid tools for gauging job satisfaction.

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