The Impact of Job Characteristics and Role Stressors on Cyberloafing: The Case of Pakistan

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Abstract- Internet technology has enabled the employees to work more efficiently and to prove themselves to be more productive. In this study, job characteristics are combined with role stressors in single modal. The purpose of this study was to explore whether all five core values of job characteristics and three types of role stressors serve as the predictors of cyberloafing behavior of employees at workplace or not. It is hypothesized separately that job characteristics and role stressors has impact on cyberloafing. Data was collected from PTCL employees who have access to internet at workplace. It is found that out of five core values of job characteristics (skill variety, task identity, task significance, job autonomy, and feedback) only skill variety and job autonomy have impact. Furthermore, out of three types of role stressors (role ambiguity, role overload, and role conflict), role ambiguity and role conflict were found to have impact on cyberloafing. Implication for employers and employees both are discussed as well.

Index Terms- Skill variety, task identity, task significance, job autonomy, feedback, role ambiguity, role overload, role conflict, cyberloafing.

I. INTRODUCTION

Computer and internet based functioning has grown very much common in the organizations in recent years. Internet is helping business in many ways through reducing cost, shortening product cycle times, and by marketing services and products without incurring much cost (Anandarajan, Simmers, & Igbaria, 2000).Since both these facilities computers and internet are playing tremendously important role not only in professional but also personal lives of workers, these things have also generated a considerable problem for management in organizations (Glassman, Prosch, & Shao, 2014).It is also seen that personal internet usage to some extent is understandable by management(Muhl, 2003). On one hand internet has helped the users to complete their assigned tasks more easily and effectively, on other hand the probability of engaging in non-work related activities such as sending or receiving personal emails, playing online game, shopping online and maintaining social connections, has also increased. This emerging kind of loafing is termed as cyberloafing(Lim, 2002; Lim & Teo, 2005). Cyberloafing also termed as cyberslacking (Vitak, Crouse, & LaRose, 2011)(Greengard & Samuel, 2000), personal internet use at work (König & Guardia, 2014).

Employees engage in cyberloafing activities due to many reasons. A number of studies are conducted to find out the antecedents of such behavior and these studies show that Employees can engage in cyberloafing activities because of stress or pressure experienced by employees at work (work stressors) which may include role ambiguity, role conflict and role overload. Employees who face job stress in any form will try to avoid this stressed situation by engaging in cyberloafing (Sawitria & Runing, 2012). The present study also intends to explore the effects of five core values of job characteristics and three major kinds of role stressors on cyberloafing. In contrast to existing research this study includes all five core values in single model along with role stressors. Five core values of job characteristics include skill variety, task identity, task significance, job autonomy and feedback. Moreover in Pakistani context studies related to cyberlofing are very limited, so this study will also explore the antecedents of cyberoafing in Pakistan.

This study expands past studies on cyberloafing by combining the various factors in single model to check the extent to which they contribute to cyberloafing. To the extent that employees' misuse ofthe internet entails considerable costs to organizations and affects employees' productivity, it is importantto understand what motivates individuals to engage in this behavior so that effective organizational intervention programmes and policies may be developed and implemented to remove or limit its occurrence. (Lim & Vivien K., 2002)

1.1Cyberloafing

Cyberloafing is the misuse of company provided internet for checking personal emails and surfing hours to websites other than work related purpose (Lim & Vivien K., The IT way of loafing on the job: cyberloafing, neutralizing and organizational justice, 2002). "Cyberloafing refers to the organization's internet usage by employees to access and send emails during workinghours with a purpose unrelated to work'' (Sawitria &Runing, 2012). Another definition is that cyberslacking is the usage of internet and mobile in working hours(Vitak, Crouse, & LaRose, 2011). Cyberslacking is "The use of web pages for personal purposes during working hours"(Andreassen, Torsheim, & Pallesen, 2014). In accordance to the definition cyberloafing was taken as production deviance(Lim & Teo, 2005), one type of workplace deviance while others were property deviance, political deviance and aggression (Robinson & Bennett, 1995). These days' human resources are considered as most important assets in every organization. But the emerging trend of internet usage addiction as social networks, quick access to news and

financial sites is transferring this 'allowance of internet use' into internet abuse (Xu, Hock-Hai Teo, & Agarwal, 2010). Also some studies suggest that using company provided internet facility for personal use is sometimes beneficial with respect to reducing boredom, avoiding stress, increasing creativity and job satisfaction (Eastin, Glynn, & Griffiths, 2007;Oravec, 2002; Reinecke, 2009).

Employees can just not merely engage in loafing on workplace, but they can also enjoy the best ofboth worlds by maintaining the position of being hard at work in the actual world and also at the same time, visiting through cyberspace by surfing Web sites for personal stakes and purposes. Cyberloafers need not be physically absent from the office for apparently long periods of time, as longas the lunchers do. Cyberloafers alsoneed not worry as much about the disclosure of their loafing like those of restroom-minded or thosewho hang out with their colleagues by the water cooler to chat. Cyberloafers, however, spend a lot of time in surfing the internet, moving from one Web site to another simply only with a click of themouse. Also, cyberloafers usually visit sites which expose the organization to legal liabilities and to the dangers posed by computer viruses. These factors taken together suggest that cyberloafers may cause a greater 'threat' to organizations relative to othertypes of loafers, in terms of productivity losses and costs incurred (Lim & Vivien, 2002).

1.2Research Question

What are the factors perceived to be important in cyberloafing of employees?
What are the significant predictors of cyberloafing?

1.3 Objective of the study

The objective of this study is:
1) To determine the factors which are perceived to be important in cyberloafing behavior of employees.
2) To determine factors those predict cyberloafing.

II.   LITERATURE REVIEW

To maintain a balance between work and non-work related activities at work has emerged as one of the major challenge for employees(Byron, 2005). It was seen that not all deviant activities prevailed equally but some are more prevalent and adopted by the employees as compare to others. Studies concluded that more prevailed activities would be less serious for example checking, sending and receiving personal mails is found commonly among the employees and it is not really serious. Furthermore it was also observed that employees try to neutralize their non-work related activities by justifying it with the perceived cyberloafing of coworkers. Internet has removed the boundaries of workplace and home so cyberloafing is considered normal behavior by the employees as they are free to perform any activity at homes(Lim & Teo, 2005).Ways to bring the employees back to focus on work activities instead of cyber loafing were studied. It was seen that proximity does not prevent from cyberloafing. Likewise monitoring also does not affect the cyberloafing behavior of employees. Interaction of these two variables, monitoring and proximity, caused no reduction in the cyberloafing. Interaction of monitoring and proximity along with punishment, however, reduced the cyberloafing behavior of

employees. Cyber loafers were not affected by the punishment alone also. It was also analyzed that certain amount of monitoring and proximity. When there is high level of proximity and high monitoring along with punishment only then it has tendency to prevent cyber loafers from indulging in cyberloafing activities(Zoghbi-Manrique-de-Lara & Olivares-Mesa, 2010).
Job characteristics/Task characteristics have been the most commonly investigated motivational work design characteristics. Task characteristics are primarily concerned with how the work itself is accomplished and the range and nature of tasks associated with a particular job (Morgeson & Humphrey, 2006). There exist a relationship between job characteristics and personal outcome. Personal outcomes include general satisfaction, growth satisfaction and internal motivation of employees(Bhatti, Syed, & Shaikh, 2012).

2.1Core Values of Job Characteristics
2.1.1Skill Variety

Skill variety is the extent to which an employee requires a wide range of skills (Katsikea, Evangelia, Theodosiou, Perdikis, & Kehagias, 2011). This characteristic of job requires large variety of expertise to finish a task. In other words, an employee needs to perform various tasks in order to complete a specific job. Skill variety is also defined as the amount of skills needed by employee for the accomplishment of particular work assignment(McKnight, Phillips, & Hardgrave, 2009). Moreover job characteristics affect personal online communication (POC) at work. Employees get engage in cyberloafing when they find their job boring because of limited number of activities or skills.Skill variety and personal online communication at work by the employees is negatively related. Furthermore organizations are facing the costly and constant threat of counterproductive behavior. One of the job characteristic, skill varieties has direct negative relation with counterproductive behavior of employees. It is obvious that if a job requires more skills to be done, it keeps the employees away from deviant behaviors (Ansari, V., Mazraeh, & Arab-Khazaeli, 2013).

H_1: *Skill variety has an impact on cyberloafing of employees.*
2.1.2 Task Identity

Task identity is defined as the degree to which employees believe that the job is specific and well designed (McKnight, Phillips, & Hardgrave, 2009). It means that if the job is well defined in nature, the workers are more motivated towards their assignments and goals. According to another definition task identity is the extent to which workers finish an entire amount of work and recognize the outcomes of their efforts (Katsikea, Evangelia, Theodosiou, Perdikis, & Kehagias, 2011). Higher level of task identity enhances the motivation level of employees and their self-actualization to the work. It booms up the employees' feelings of work accomplishment. Also all core values of job characteristic do not show the same impact on studied the impact on job satisfaction and affective commitment. Among all job characteristic task identity along with task variety showed no impact on either affective commitment or job satisfaction (Ozturk, Hancer, & Im, 2014). Task identity enables an employee to feel his job meaningful which ultimately provides him satisfaction. More the task or job is meaningful

perceived by the person, more he will be motivated to perform well. (Lau, Bin, & Huang", 1999).

H_2: *Task identity has an impact on cyberloafing of employees.*
2.1.3 Task Significance

Task significance determines the importance of a job. It isdefined the as the extent to which a job has a significant impact on the lives and work of other co-workers. This characteristic is about the outcomes of the job that how significantly the job of a worker is affecting the work of another worker. This may have a positive or negative impact on the job of another employee. Task significance is very important characteristic of a job as it has a great impact on the work of other colleagues (Katsikea, Evangelia, Theodosiou, Perdikis, & Kehagias, 2011).Task significance is the extent to which the job or work of one can effect more or less to the lives of other person either in the same organization or in external environment. For example if medical researcher works in a lab to prepare drug to cure some disease, it would influence so many people's lives. In terms of employees of some organization task significance can be assumed as the degree to which the job of one employee contributes towards the achievement of the overall goal of the organization (Lunenburg, 2011).Job characteristics are the tool to measure the performance of employees. Task significance is not considered as much important for salesperson's activities as those of other business and organizational employees have (Becherer, Morgan, & Richard, 1982).

H_3: *Task significance has an impact on cyberloafing of employees.*
2.1.4 Autonomy

Autonomy is the extent to which an employee has a liberty to schedule, prioritize and perform his job in his own way(Katsikea, Evangelia, Theodosiou, Perdikis, & Kehagias, 2011). An employee has freedom to make his choices of work priorities. Autonomy provides the employees an opportunity to schedule their work in accordance to their conveniences. Autonomy decreases the work exhaustion by permitting self redirection of the endeavors of employees.

Job autonomy is considered as a basic tool to develop the sense of responsibility in employees (Lunenburg, 2011). Furthermore a study was conducted to investigate the effect of job characteristic on personal online communication (POC) of employees at work. This study revealed that employees having high level of job autonomy are usually more engaged in personal online communication. Positive relationship between job autonomy and POC shows that this does not affect productivity in any negative way. And also POC to some extent helps employees to refresh their minds(Jian, 2013).

H_4: *Job autonomy has an impact on cyberloafing of employees.*
2.1.5Feedback

Feedback is the response from the supervisor regarding the quality of work done by the employees. Managers communicate to the employees that how efficiently they have performed their job (McKnight, Phillips, & Hardgrave, 2009). According to another definition feedback is a way of getting the clear and complete information and remarks about one's performance of

the work or tasks that are assigned to him. It can be positive and negative as well. Feedback should occur on frequent basis rather on delayed time lag to avoid any negative circumstances in final performance evaluation procedure (Lunenburg, 2011). When an employee is satisfied with his job, he will be committed to the organization and his work. Impact of feedback on affective commitment and job satisfaction was studied. Studies revealed that there is significant affect of feedback on job satisfaction and affective commitment(Ozturk, Hancer, & Im, 2014). In addition, while determining various predictors of counterproductive work behavior of employees. It was found that feedback is not a reason for deviant behavior of employees at (Ansari, V., Mazraeh, & Arab-Khazaeli, 2013).So it is possible that employees engage in cyberloafing when they are not receiving any feedback and they are free to do whatever they want without considering the outcomes in the form of negative feedback.

H_5: *Feedback has an impact on cyberloafing of employees.*
2.2 Role Stressors

A role stressor can be defined as the pressure experienced by an individual as a result of organizational and job-specific factors in the form of demands and constraints that have been placed on them (Kahn, Wolfe, Quinn, Snoek, & Rosenthal, 1964).Previous studies show that stress faced by employees affect them not only mentally but also physically. A study showed that if employees experience stress at workplace it affects their physical as well as mental health which ultimately influence employees' turnover intentions and job performance(Hang-yue, Foley, & Loi, 2005). Role stressors can be divided into three types that are: role overload, role conflict and role ambiguity.

2.2.1 Role Ambiguity

Role ambiguity occurs when an individual does not have clear information about the expectations of his or her role in the job or organization (Rizzo, House, & Lirtzman, 1970).

Role ambiguity could be measured by investigating the amount of information provided to him in relevance with his or her job. It may occur either due to role of employee at organization or just because of surrounding or organizational culture around him (Bedeian & Armenakis, 1981). A person becomes doubtful when he does not know his legal limits at his workplace that affects his as well as organizational performance. there are two perspectives of role ambiguity; one related to the personal or role tasks and activities needed to accomplish goals while the other is considering with the other is concerning with feedback for his performance (Fisher & Gitelson, 1983).

Insufficient knowledge for fulfilling the organizational rationales may be termed as role ambiguity(Luthans & Thomas, 1989). And this is due o poor flow of communication among supervisors and sub ordinates or employees' inadequate training and unclear role expectations. Furthermore role ambiguity has positive relationship with cyberlaofing (Blanchard & Henle, 2008).

H_6: *Role ambiguity has an impact on cyberloafing of employees.*
2.2.2 Role Overload

Work overload is being presented as imbalance in the requirement of task, and the time allowed and at the availability of resources to fulfill the task requirements (Rizzo, House, & Lirtzman, 1970). This problem of work overload is faced when the work role of an employee is followed by more work, shortage of time, sharp deadlines coupled with less resources required for the performance of duties, the tasks due and the work role related responsibilities (Glazer & Beehr, 2005). Studies show that role overload does not directly cause the employees to cyberloaf but it's the internet experience that moderates the relationship between role overload and cyberloafing (RuningSawitria, 2012).Furthermore in another study it was seen that role overload does not force employees to involve in cyberloafing whereas other kinds of role stressors (role ambiguity and role conflict) do (Blanchard & Henle, 2008).

H_7: *Role overload has an impact on cyberloafing of employees.*

2.2.3 Role Conflict

"Role conflict refers to the incompatibility in communicated expectations that impinge on perceived role performance." (Rizzo, House, & Lirtzman, 1970). Like role overload, role conflict also influences employees in many ways. (Rizzo, House, & Lirtzman, 1970) in their study demonstrated that role conflict and role ambiguity are two constructs negatively correlated with each other and job outcomes. These two concepts of role stressor are discussed together in various researchers and found to be significantly related with productivity, employee turnover frequency and absenteeism (Onyemah, 2008).

Employees are more willing to cyberloaf when they feel that there exists role conflict. When the employees are not clear about their duties and tasks or when they donot aware of the procedure necessary to accomplish these tasks they cyberloaf to avoid this role stressor (Blanchard & Henle, 2008). Moreover a study conducted on all three types of role stressors and cyberloafing shows that role conflict and cyberloafing has direct positive relationship among them (RuningSawitria, 2012).

H_8: *Role conflict has an impact on cyberloafing of employees.*

III. METHOD

3.1 Sample

The purpose of this study is to examine the impact of job characteristics and role stressors on cyberloafing. In order to obtain data, questionnaires were distributed to 325 employees of Pakistan Telecommunication Company Limited (PTCL) in Lahore by using convenience sampling technique. Out of 325 distributed questionnaires 289 were used for further investigation purpose. Response rate was 89%. The summary of demographics description is revealed through table 1. An examination of the demographics shows that respondents were qualified enough to understand the phenomenon under study.

3.2 Data collection

Data was collected through personal links and visit to the offices of PTCL in different regions of Lahore.The questionnaire based on 5 Likert scales (1 = strongly disagree; 5 = strongly agree), were used.

3.3 Conceptual Framework

According to previous literature review, following model is constructed for the study.
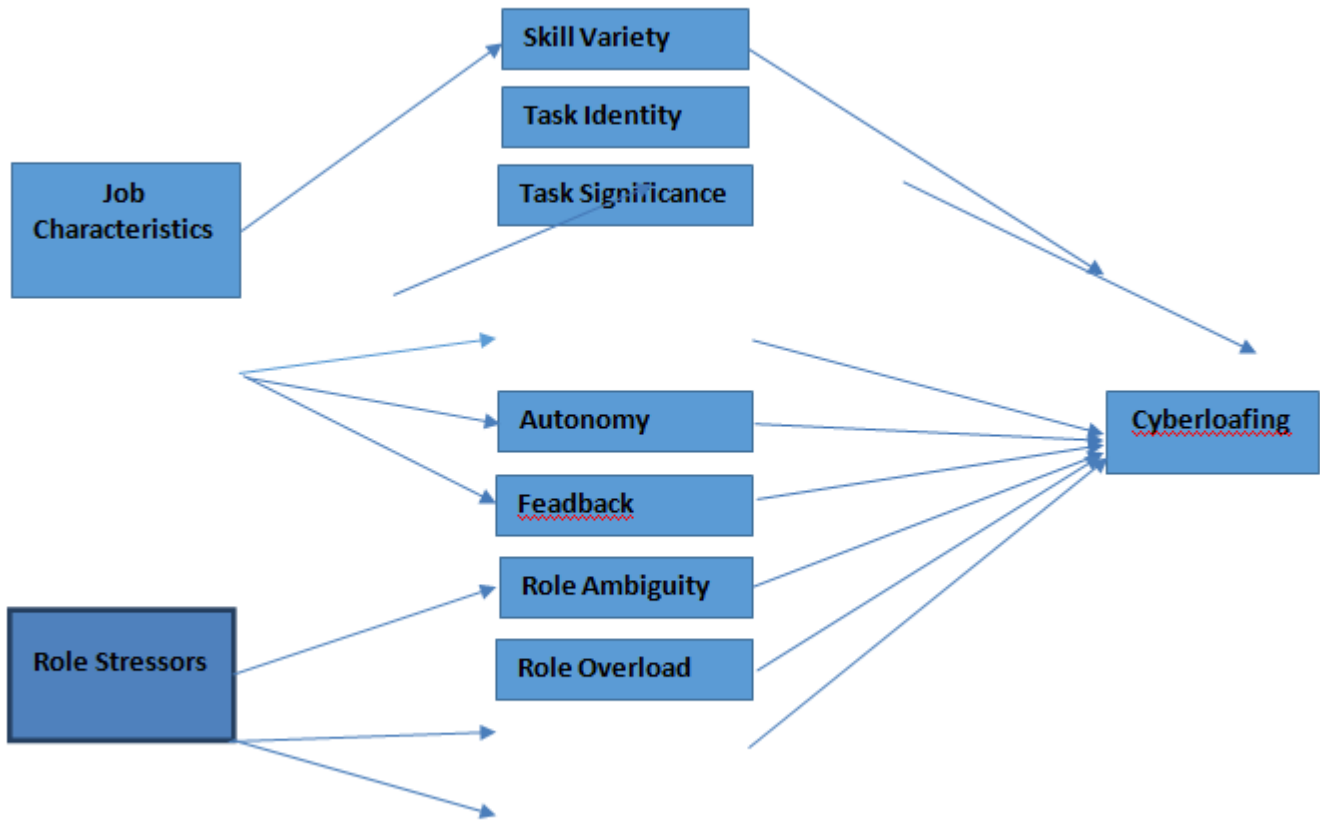
Table 1: Demographic analysis

Factors	Classification	No. of respondents	Percentage
	Male	215	74.4
Gender	Female	74	25.6
	20-25	93	33.2
	26-30	126	43.6
Age(years)	31-35	32	11.1
	36-40	13	4.5
	Above 40	25	8.6
	Below 1	104	36.0
	1-5	135	46.7
Job tenure(years)	6-10	33	11.4
	Above 10	17	5.9
	Manager	206	71.3
Job position	Non manager	83	28.7
	1-3	111	38.4

Internet usage hours	3-6	107	37.0	
	6-9	45	15.6	
	Above 9	26	9.0	

3.3 Measure

Excluding demographics the responses against the variables are taken by using five point Likert scales (1 = strongly disagree; 5 = strongly agree), with items coded in such a way that higher score shows the high amount of understudy variables.

3.3.1 Cyberloafing

Cyberloafing which is the dependent variable of the study was measured by using the scale of (Blanchard & Henle, 2008), which consist of 17 items (α = 0.931) including sample items "send non-work emails", "visit news site", "download music" etc.

3.3.2 Job characteristics

Five dimensions of job characteristics including skill variety, task identity, task significance, job autonomy and feedback were measured through adopting the scale of (Johari, Mit, & Yahya, 2009). This scale consist of two items (α = 0.852), two items (α =0.857) of task identity, two items (α =0.864) of task significance, two items (α =0.897) of job autonomy and three items (α =0.928) of feedback.

3.3.3 Role stressors

Role stressors are divided into three types, which are measured through adopting the scale of (Vanishree, 2014). This scale consist of five items (α=0.849) of role ambiguity, role overload has five items (α =0.849) and role conflict has four items (α =0.748).

IV. RESULTS

The results of means, standard deviations and correlation analysis for the current study variables are shown in table 2. Internal consistency of the scale was o.726. All of the correlations were in the predicted direction and each variable is correlated with cybreloafing with significance level of 0.01. For example, skill variety is negatively correlated with cybreloafing and role ambiguity is positively correlated with cyberlaofing with significance level of 0.01.

Table 2: Descriptive statistics and correlation analysis among the variables of the study

		Mean		1	2	3	4	5	6	7	8	9
1	Cyberloafing	3.77	.7654	1								
2	Skill variety	2.18	1.077	-.723**	1							
3	Task identity	2.19	1.094	-.703**	.962**	1						
4	Task significance	2.19	1.082	-.691**	.946**	.976**	1					
5	Job autonomy	3.80	.9963	.614**	-.651**	-.634**	-.620*	1				
6	Feedback	2.20	1.110	-.663**	.828**	-.837**	.829**	-.667**	1			
7	Role ambiguity	3.85	.9026	.870**	-.688**	-.678*	-.660**	.699**	-.646**	1		
8	Role overload	3.71	.8498	.628**	-.631**	-.611**	-.596**	.492**	-.541**	.581**	1	
9	Role conflict	3.66	.7464	.714**	-.697**	-.689**	-.684**	.569**	-.613**	.660**	.772**	1

* p< .05.
** p < .01.

We conducted multiple regression analysis, for this purpose all dimensions of job characteristics and all types of role stressors are entered to test the main effects on dependent variable i.e; cybreloafing. Results of the multiple regression analysis are shown in table 3.

Table 3: Multiple regression analysis

Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	**Std. Error**	**Beta**		
(Constant)	1.383	.231		5.992	.000
Skill variety	-.167	.071	-.234	-2.342	.020
Task identity	.112	.101	.160	1.105	.270
Task significance	-.029	.087	-.042	-.338	.736
Job Autonomy	-.079	.031	-.102	-2.551	.011
Feedback	-.051	.035	-.074	-1.442	.151
Role Ambiguity	.579	.036	.683	16.016	.000
Role overload	.039	.038	.043	1.025	.306
Role conflict	.165	.049	.161	3.389	.001

a. Dependent Variable: Cyberloafing

Hypothesis 1 which states that skill variety has an impact on cybreloafing was supported by the analysis (β =-.167, p< 0.05). This shows that skill variety has significant impact on cybreloafing which is consistent with the previous studies of (Jian, 2013). Hypothesis 2 according to which task identity has an impact on cybreloafing was not supported by our study (β=.112, p > 0.05). Hypothesis 3 states that task significance has an impact on cybreloafing, this hypothesis is also not supported by the study (β=-.029, p>0.05). This result indicates that there is no significant impact of task significance on cybreloafing. Hypothesis 4 is supported by the study which shows that there is significant impact of job autonomy on cybreloafing (β=-.079, p <0.05) same as the results in previous findings of (Jian, 2013).Hypothesis 5 stating that feedback has an impact on cybreloafing is not supported by the current research (β=-.051, p>0.050), which means feedback is not one of the significant predictor of the cybreloafing. Hypothesis 6 was strongly supported by the study (β=0.579, p<0.01), this indicates that role ambiguity has significant impact on cybreloafing. This result matches the results of previous study of (Blanchard & Henle, 2008). Hypothesis 7 which states that role overload has an impact on cybreloafing, it is also not supported by the current study (β= .039, p>0.05).Hypothesis 8 stating role conflict has an impact on cybreloafing was supported by the results of the current research (β=0.165, p<0.01).

The results of the multiple regression analysis can be summarized as follows:

$$Y = 1.383 - 0.167x_1 + 0.112x_2 - 0.029x_3 - 0.079x_4 - 0.051x_5 + 0.579x_6 + 0.039x_7 + 0.165x_8$$

Where Y= Cyberloafing, x_1= skill variety, x_2 = task identity, x_3 = task significance,

x_4 = job autonomy, x_5 = feedback, x_6 = role ambiguity, x_7 =role overload,

x_8 = role conflict.

V. DISCUSSION

The new emerging kind of loafing that is studied in this study (cybreloafing) is taking high consideration near the higher authorities of the organizations. There are many studies in which factors that cause cybreloafing are being studied. In this study five core values of job characteristics and three main types of role stressors are studied in order to determine the factors that are predictors of cybreloafing and those which are perceived to be important in cybreloafing. Results of the study showed that all of the five core values are correlated with the cybreloafing. O out of these five values skill variety has significant negative impact on cybreloafing. This means more a job's requirement is to have variety of tasks less the employee will be inclined towards

cybreloafing. Job autonomy has significant positive impact on cybreloafing. An employee who is free to perform his duty according to his own way or schedule his tasks according to his own priorities is tends to indulge in cybreloafing more. All three types of role stressors showed positive correlation with cybreloafing. Role ambiguity and role conflict has significant positive impact on cybreloafing whereas role overload does not show significant impact on cybreloafing. Conclusively, it can be summarized as that all the under studied core values of job characteristics and all types of role stressors are predictors of cybreloafing but skill variety, job autonomy, role ambiguity and role conflict are significant predictors of cybreloafing.

VI. LIMITATIONS

Like most of the other research, our research also has some limitations. As our data were cross sectional in nature so it is less generalizable because it is possible that an employee who is facing the problem of role conflict or role overload may not have it in future. Sample was selected randomly and convenience sampling technique was used so this study could produce more reliable results if sample is selected by stratified sampling.

REFERENCES

[1] Anandarajan, M., Simmers, C., & Igbaria, M. (2000). An exploratory investigation of the antecedents and impact of internet usage: An individual perspective. *Behaviour and Information Technology, 19* (1), 69-85.

[2] Anderson, A., & Craig. (2004). An update on the effects of playing violent video games. *Journal of Adolescence, 27*, 113-122.

[3] Battistelli, A., Montani, F., & Odoardi, C. (2013). The impact of feedback from job and task autonomy in the relationship between dispositional resistance to change and innovative work behaviour. *European Journal of Work and Organizational Psychology, 26*, 26-41.

[4] Bedeian, A. G., & Armenakis, A. A. (1981). A path-analytic study of the consequences of role conflict and ambiguity. *Academy of Management, 24* (2), 417-424.

[5] Blanchard, A. L., & Henle, C. A. (2008). Correlates of different forms of cyberloafing:The role of norms and external locus of control. *Computers in Human Behavior* , 1067–1084.

[6] Coker, B. L. (2013). Workplace Internet Leisure Browsing. *Human Performance, 26*, 114-125.

[7] Eastin, M. S., Glynn, C. J., & Griffiths, R. P. (2007). Psychology of communication technology use in the workplace. *CyberPsychology and Behavior, 10* (3), 436-443.

[8] Glassman, J., Prosch, M., & Shao, B. B. (2014). To monitor or not to monitor: Effectiveness of a cyberloafing countermeasure. *Information & Management* , 1-13.

[9] Glazer, S., & Beehr, T. A. (2005). Consistency of implications of three role stressors across four countries. *Journal of Organizational Behavior, 26* (5), 467-487.

[10] Humborstad, S. I., & Kuvaas, B. (2013). Mutuality inleader–subordinate empowermentexpectation: Its impact on role ambiguity and intrinsic motivation. *The LeadershipQuarterly, 24*, 363–377.

[11] Johari, J., Mit, D. A., & Yahya, K. K. (2009). Construct validation of the job characteristics scale in the malaysian public service setting. *International Review of Business Research Papers* , 58-71.

[12] Kahn, et al. (1964). Organizational Stress: Studies in Role Conflict and Ambiguity. New York:

[13] König, C. J., & Guardia, M. E. (2014). Exploring the positive side of personal internet use at work: Does it help in managing the border between work and nonwork? *Computers in Human Behavior, 30*, 355-360.

[14] Lara, P. Z., Tacoronte, D. V., & Ding, J.M. T. (2006). Do current anti-cyberloafing disciplinary practices have a replica in research findings? A study of the effects of coercive strategies on workplace Internet misuse. *Internet Research, 16* (4), 450-467.

[15] Lau, G. T., Bin, S., & Huang. (1999). The influence of task characteristics and job-related characteristics on retail salesperson selling orientation. *Journal of Retailing and Consumer Services, 6*, 147-156.

[16] Li, A., & Bagger, J. (2008). Role ambiguity and self-efficacy: The moderating effects of goal orientation and procedural justice. *Journal of Vocational Behavior, 73*, 368-375.

[17] Lim, & Vivien K., G. (2002). The IT way of loafing on the job: Cyberloafing, neutralizing and organizational justice. *Journal of Organizational Behavior, 23*, 675-694.

[18] Lim, Vivien. K., & Teo, T. S. (2005). Prevalence, perceived seriousness, justification and regulation of cyberloafing in Singapore An exploratory study. *Information and Management* (42), 1081–1093.

[19] Lunenburg, F. C. (2011). Motivating by enriching jobs to make them more interesting and challenging. *International Journal of Management, Business, And Administration, 15*, 1-11.

[20] Luthans, F., & Thomas, L. T. (1989). The relationship between age and job satisfaction: curvilinear results from an empirical study – A research note. *Personnel Review, 18* (1), 23-26.

[21] McKnight, D. H., Phillips, B., & Hardgrave, B. C. (2009). Which reduces IT turnover intention the most: Workplace characteristics or job characteristics? *Information & Management, 46* (3), 167-174.

[22] Melamed, S., Ben-Avi, I., Luz, J., & Green, M. S. (1995). Objective and subjective work monotony: Effects on job satisfaction, psychological distress, and absenteeism in blue-collar workers. *Journal of Applied Psychology, 80* (1), 29-42.

[23] Mishra, & Shukla. (2012). Impact of creativity on role stressors, job satisfaction and organisational commitment.*Journal of Organisation and Human Behaviour, 1* (3), 18-26.

[24] Morgeson, F. P., & Humphrey, S. E. (2006). The work design questionnaire (wdq): Developing and validating a comprehensive measure for assessing job design and the nature of work. *Journal of Applied Psychology, 91*, 1321–1339.

[25] Muhl, C. J. (2003). Workplace e-mail and Internet use: Employees and employers beware. *Monthly Labor Review, 126*, 36-45.

[26] Oldham, G. R., & Hackman, J. R. (1976). Conditions under which employees respond positively to enriched work. *Journal of Applied Psychology* , 395-403.

[27] Onyemah. (2008). Role ambiguity, role conflict, and performance: Empirical evidence of an inverted-U relationship. *Journal of Personal Selling and Sales Management* , 299-313.

[28] Oravec, J. A. (2002). Constructive approach to internet receration in the workplace. *Communications of the Acmm, 45* (1), 60-63.

[29] Ozturk, A. B., Hancer, M., & Im, J. Y. (2014). Job characteristics, job satisfaction, and organizational commitment for hotel workers in Turkey. *Journal of Hospitality Marketing and Management, 23*, 294–313.

[30] Park, R., & Searcy, D. (2012). Job autonomy as a predictor of mental well-being: The moderating role of quality-competitive environment. *Journal of Business Psychology, 27*, 305–316.

[31] Reinecke, L. (2009). Games at work: The recreational use of computer games during working hours. *CyberPsychology and Behavior, 12* (4), 461-465.

[32] Rizzo, House, & Lirtzman. (1970). Role conflict and ambiguity in complex organizations. *Administrative Science Quarterly, 15*, 50-63.

[33] Robinson, S. L., & Bennett, R. J. (1995). A typology of deviant workplace behaviors: A multidimensional scaling study. *Academy of Management Journal, 38*, 555–572.

[34] Sawitria, & Runing, H. S. (2012). Role of internet experience in moderating influence of work stressor on cyberloafing.*Procedia - Social and Behavioral Sciences, 57*, 320 – 324.

[35] Schulz, J., & Auld, C. (2006). Perceptions of role ambiguity by chairpersons and executive directors in queensland sporting organisations. *Sport Management Review, 9*, 183-201.

[36] Vanishree, P. (2014). Impact of role ambiguity, role conflict and role overload on job stress in small and medium scale industries. *Research Journal of Management Sciences, 3* (1), 10-13.

[37] Vitak, J., Crouse, J.,& LaRose, R. (2011). Personal internet use at work: Understanding cyberslacking. *Computers in Human Behavior, 27*, 1751–1759.

[38] Wana, H. C., Downey, L. A., & Stough, C. (2014). Understanding non-work presenteeism: Relationships between emotional intelligence, boredom, procrastination and job stress. *Personality and Individual Differences, 63*, 86-90.

[39] West, M. A., & Farr, J. L. (1990). Innovation at work. Innovation and creativity at work: psychological and organizational strategies , 3-13.

[40] Wu, L., & Norman, I. (2006). An investigation of job satisfaction,organizational commitment and role conflict and ambiguity in a sample of Chinese undergraduate nursing students. *Nurse Education Today, 26*, 304–314.

[41] Xu, H., Hock-Hai Teo, B. C., & Agarwal, R. (2010). The role of push-pull technology in privacy calculus the case of location-based services. *Journal of Management Information System, 26* (3), 135-174.

[42] Young, D. K., & Case, D. C. (2002). Employee internet management: employee internet management. *CyberPsychology and Behavior, 5* (4), 355-361.

[43] Young, K. S., & Case, C. J. (2004). Internet abuse in the workplace: New trends in risk management. *CyberPsychology and Behavior, 7* (1), 105-111.

[44] Zoghbi-Manrique-de-Lara, P., & Olivares-Mesa, A. (2010). Bringing cyber loafers back on the right track. *Industrial Management and Data Systems, 110* (7), 1038 - 1053.

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