

Consideration of Future Consequences as an antecedent of Employee Cyberloafing Behavior among selected working adults in Nigeria

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ABSTRACT

Cyberloafing – non-work-related usage of organization Internet during work time by workers has been a major concern by organizations. Drawing from construal level theory, this paper takes an individual trait-based approach and investigates the impact of personality trait consideration of future consequences (CFC) on cyberloafing. Specifically, it was argued that while general traits, like the “Big Five,” will be significant predictors of employee’s cyberloafing, other personality traits such as CFC, will have additional explanatory power on why employee engaged in Cyberloafing. Survey data was collected online from 188 working adults in Nigeria. SmartPLS SEM 2.0 (M3) was applied to test the hypotheses that comprised both consideration of future consequences immediate (CFC-I) and consideration of future consequences future (CFC-F) on Cyberloafing and consequently bootstrapping was conducted to investigate the standard error of the estimate and t-values. The model tested suggests as expected that consideration of future consequences future (CFC-F) negatively related to cyberloafing and consideration of future consequences immediate (CFC-I) positively predict cyberloafing. This paper adds further theoretical support to the utility of CFC construct, construal level theory and cyberloafing literature. Finally, the study implications for research, managerial practice, future directions and study limitations are discussed.

Keywords: Cyberloafing, Consideration of future consequences, Personality traits, Counterproductive work behavior, Nigeria

1. INTRODUCTION

The advance of Internet links millions of businesses and determines how, when and where business transactions are conducted. As noted by Jia, Jia, and Karau,

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(2013) that the Internet can be used to improve organizational effectiveness and efficiency; its easy access also provided workers with the opportunity to engage in cyberloafing. Importantly, cyberloafing refers to non-work-related usage of organization Internet during work time by workers, such as personal use of the Internet; watching YouTube; downloading music; online gambling; Facebooking among others (Lim, 2002; O'Neill, Hambley & Bercovich, 2014; Vitak, Crouse & LaRose, 2011). This behavior is one of the category of production-related deviant use of information technology at work (Mahatanankoon, 2006) and recurrent phenomenon in organizations (Cullen & Sackett, 2003) and is regarded as the most contemporary way workers waste time at work (Askew et al., 2014). This phenomenon is also referred to as personal Web use (Anandarajan, Simmers, & Igbaria, 2001), internet misuse (de Lara, Tacoronte & Ding, 2006), cyberslacking (Lavoie, & Pychyl, 2001; Whitty, & Carr, 2006), cyberslouching (Urbaczewskiv & Jessup, 2002), cyberbludging (Mills et al., 2001) or non-work-related computing (Bock & Ho, 2009).

Although some literature contended that, when correctly used, cyberloafing can have a positive impact on organizational productivity by increasing creativity or providing refreshment to the workers (Terr, 1999); this behavior is now ever costly to organizations. For instance, report emanated that on average, American workers admit wasting more than two working hours each day using organization internet for personal use (Fox, 2010). In addition about 90% of workers spend hours surfing recreational websites (Sharma & Gupta, 2004). In an economic term, this phenomenon costs U.S. companies an estimated productivity loss of \$54-85 billion annually (Lim, & Teo, 2006). Within the UK, this phenomenon is costing small businesses about £1.5bn annually (BBC, 2002) and £300 million dollars to employers annually (Taylor, 2007). Notwithstanding, the further threats to the organization's computers such as computer viruses, hackers infiltrating the organization networks, pressure on organizational bandwidth or unintentionally circulating of organization's confidential information (Nov & Ye, 2008) are major concerns among the stakeholders.

Nigeria is also not immune from this issue (Kura, Shamsudin & Chauhan 2015; Ugwu, 2011). As Nigeria aims to achieve her vision 2020 of becoming a viable socio-economic development by the year 2020 (National Planning Commission, 2010); Cyberloafing behaviors however pose threat to productivity of labor force and deserves special attention.

To manage the effect of this problem within the organizations, various organizations have established Internet use policy for control mechanisms (Siau, Nah & Teng, 2002), some provided management training (Young & Case, 2004), and some go to the extent of monitoring workers' Internet usage (Kankanhalli, Teo, Tan & Wei, 2003). Similarly, in an effort to understand why employees engage in cyberloafing, many studies were conducted with various antecedents such as organizational characteristics (Lieberman et al., 2011), Work environment

(Askew, Coover, Vandello, Taing, & Bauer, 2011), organizational justice (de Lara, 2006; Lim, 2002), organization sanctions and policies (Ugrin & Pearson, 2013), social norms (Askew, 2014), trust (Alder, Noel & Ambrose, 2006), and work stressors (Henle & Blanchard, 2008). Other studies also considered individual level variables such as self-esteem (Lim & Teo, 2006), and locus of control (Chak & Leung, 2004). But little attention is given to the role of personality factors in predicting cyberloafing (Jia, Jia, & Karau, 2013). This study therefore answers the call of Richards' (2012) for more studies in this area, as it intends to contribute to the body of knowledge on this phenomenon by exploring the use of CFC construct. In particular, this study draws from Trope and Liberman's (2003) construal level theory to argue for a use of CFC as predictor of employee cyberloafing. This construct has been shown to be related with a wide variety of personally and socially-significant behaviors (Joireman, Sprott, & Spangenberg, 2005). However, to date, with the exception of Zhang, Zhao, Liu, Xu, Lu, (2015) no other empirical study has examined how CFC relates to employee's tendencies to engage in Cyberloafing despite the wider application of CFC construct within many domains. In fact, the study of Zhang et al did not consider actual employee cyberloafing behavior but intention. In this view, the author recommended the use of actual behavior as proposed in this study thereby filling a gap in literature. Aside, the study of Zhang et al was conducted in an emerging economy and the findings cannot be generalized for a developing country like Nigeria where the level of technology maturity is still very low and others users attribute are also different. As argued by Poong, Yamaguchi and Takada (2016), different countries yield different results in terms of information system strategies as the strategies deployed in an emerging country like China may not be directly transposed to a developing country like Nigeria. This therefore points to the fact that region-specific research is required to fill a knowledge gap.

This paper has two main objectives. The first is to investigate the role of CFC in predicting cyberloafing behavior while the second is to highlight the possible strategies that can be used by practitioners to reduce cyberloafing activities. Hence, the remaining part of the paper is organized as follows. Section 2 contains the review of relevant literature on the CFC and cyberloafing which is the basis of theoretical foundation for the proposed model that led to the development of the hypotheses of the study. Section 3 describes methodology employed. Section 4 offers the data analysis and findings. Section 5 provides discussion of theoretical and practical implications. Section 6 is the theoretical contributions. Section 7 deals with the limitations and directions for possible future research.

2. LITERATURE REVIEW AND HYPOTHESIS DEVELOPMENT

2.1 Cyberloafing

The seminal paper of Lim (2002) conceptualized cyberloafing as part of the category of deviant workplace behaviour that damages the organizational productivity (Bennett & Robinson 2000). Askew, Coover, Vandello, Taing, and Bauer (2011) describe cyberloafing as a set of behaviors in which an employee engages in electronically mediated activities that his or her immediate supervisor would not consider job-related. Blanchard and Henle (2008) viewed cyberloafing as the frequent and personal use of Internet at work by the employees while they disguised doing the actual work. In this paper, cyberloafing was defined as voluntary acts of employees using their companies Internet access for non-work-related purposes during working hours (Lim, 2002).

Importantly, several factors were identified on why employee engaged in cyberloafing in the literature. For example, cultural norm of the organization (D'Abate, 2005), lack of job satisfaction (O'Neill, Hambley & Bercovich, 2014), sources of stress reduction (Lim & Chen, 2009), being high among younger employees (Vitak et al., 2011), and to achieve more happiness in the work (Stanton, 2002). Another empirical study submitted that employees with higher jobs status, higher education levels and higher earnings are likely to engage in cyberloafing (Garrett & Danziger, 2008). Lim and Chen (2012) reported men were more expected to engage in cyberloafing activities at work compared to women.

Given a number of factors identified above, some scholars have however argued that understanding the characteristics of employees that are likely to engage in cyberloafing are not well established (Vitak, Crouse & LaRose, 2011). In cyberslacking literature, empirical studies have established a relationship between individual personality types and cyberslacking. For example, Chen, Chen and Yang (2008) submitted that workers with high external locus of control and low self-esteem engaged less in Cyberloafing behavior. O'Neill, Hambley and Bercovich (2014) and O'Neill, Hambley and Chatellier (2014) submitted that cyberslacking has positive association with procrastination, but inversely related with conscientiousness, honesty and agreeableness. Similarly, Jia, Jia, and Karau (2013) reported that emotional stability, conscientiousness were inversely related with cyberloafing. Recently, Zhang et al. (2015) submitted that individual differences in confederation of future consequences are negatively associated with cyberloafing behaviors in an effort to understand employee cyberloafing behavior in China.

2.2 Consideration of Future Consequences

Consideration of future consequences (CFC) is the “extent to which individuals are likely to consider distant outcomes in choosing their present behavior” (Strathman, Gleicher, Boninger, & Edwards, 1994, p, 742). In other words, CFC refers “to the extent to which individuals consider the potential distant outcomes of their current behaviors and the extent to which they are influenced by these potential outcomes” (Strathman et al., 1994, p, 743). People with low CFC assign a high level of significance to the immediate consequences, while people high in CFC assign a high level of significance to the future consequences (Joireman, Balliet, Sprött, Spangenberg, & Schultz, 2008). Several empirical studies have identified the evidence that the construct is meaningful and has consequences for attitudes and behaviors. For instance, relative to individual that is low in CFC, individual that is high in CFC may engage less in smoking and alcohol use (Adams & Nettle, 2009) uses condom for protective sex (Appleby et al., 2005), knows their HIV status (Dorr et al., 1999), uses sunscreen to avoid exposure (Orbell & Kyriakaki, 2008), exercises regularly (Adams & Nettle, 2009), engages in healthy eating (Piko & Brassai, 2009), and takes actions to prevent future illnesses (Sirois, 2004). Similarly, compare to individual that is low in CFC, individual high in CFC is more concerned about the environment (Arnocky, Milfont, & Nicol, 2014). It is expected also in this study that individual high in CFC is not likely to engage in cyberloafing and vice versa.

A study by Strathman et al. (1994) supported that the construct has only one underlying factor after conducting confirmatory and exploratory factor analyses and found the 12-item CFC. However, Petrocelli (2003) supported the presence of two fundamental factors, including an immediate and a future sub-factor, though the author did not examine the implications of these factors. This is in line with the work of Joireman et al. (2008) that distinguished CFC-Immediate and CFC-Future sub-scales and identified the construct that contains these two underlying factors and encouraged the future studies to use these two sub-scales. In addition, other studies provide considerable support for two-factor model (Adams, 2012; Petrocelli, 2003; Rappange et al., 2009; Ryack, 2012; Toepoel, 2010). The benefit of using the two factor model is that using the one factor model score “combines future-oriented items with reverse-coded immediate items for a “CFC-Total” score, raising problems of interpretation” (Joireman, 2014, p, 7; see Joireman, & King, 2016 for review). Therefore this study utilizes this distinction by using the two-factor model.

Zhang et al. (2015) submitted that individual differences in confederation of future consequences are negatively associated with cyberloafing behaviors in a study conducted in China. Building on the Liberman and Trope (2003) theory, the objective of this study is to further examine whether the consideration of future consequences is valid antecedents, predictors of cyberloafing in Nigerian context. Therefore, the following hypotheses are advanced:

H1: There is negative relationship between consideration of future consequences future (CFC-F) and cyberloafing behavior.

H2: There is positive relationship between consideration of future consequences immediate (CFC-I) and cyberloafing behavior.

3. METHOD

This study adopted the survey design approach. 188 responses were collected online from working adults with access to Internet at work in Nigeria. This method of data collection was deemed appropriate because previous study has shown that respondents demonstrate lower social desirability when responding to an online questionnaire rather than a paper-based (Joinson, 1999). All the measures were adopted from the previous studies of Teo (2005) and Strathman et al. (1994). SmartPLS 2.0 (M3) was applied to test the hypotheses that comprised both consideration of future consequences immediate (CFC-I) and consideration of future consequences (CFC-F) on Cyberloafing. Of the 188 participants, 128 were male (65%) and 69 were female (35%) which characterized the demographic of participants.

3.1 Measures

3.1.1 Cyberloafing

The measures of cyberloafing were adopted from Lim and Teo's (2005) that reported the internal consistency of 0.90 for the e-mailing activities and 0.85 for the browsing activities. Which consisted of two categories of three items for e-mailing activity and ten items for browsing activity, making the total of 13 items of which the respondents responded to the question online using the five-point scale, ranging from '1' "constantly" to '5' "never." Example of items includes: "I check non-work related e-mail while working" and "I visit entertainment-related Websites".

3.1.2 Consideration of Future Consequences

The measures of consideration of future consequences were adopted from Strathman et al. (1994) 12-item CFC scale. Which consisted of two subscale based on Joireman et al. (2008) differentiation. Seven items for CFC-immediate with reliabilities of 0.87 and five items for the CFC-Future hat reported the reliability of 0.78 (Joireman et al., 2008).The respondent responded to the question online meant to examine the level to which they ponder the consequences of their behavior using the five point Likert scale ranging from "1" "strongly disagree" to "5" strongly agree". Example of the items includes: "I am willing to sacrifice my immediate happiness or well-being in order to achieve

future outcomes” and “My convenience is a big factor in the decisions I make or the actions I take”.

4. RESULT

To analyze the collected data, the partial least squares (PLS) SEM method was used. The rationale for choosing this method includes: Firstly, PLS technique is a better means of prediction as this study intends to extend the existing theory (Hair et al, 2011). Secondly, PLS method has the ability to handle both reflective and formative constructs (Chin, 1998) and finally, PLS places minimal limitations on distributional characteristics and sample size.

This paper employed two-step analysis technique as suggested by Anderson and Gerbing (1988) and followed the recommendations of Hair et al. (2011), the bootstrapping method (5000 resample) was also conducted to determine the significance levels for the loadings, path coefficients and weights. Importantly, the two step approach requires the researcher to run the measurement model first and structural model second. The essence of the measurement model is to help to establish content validity, convergent validity and discriminant validity as all these would help to establish validity and reliability of the construct (Hair et al., 2014). The structural model requires the researcher to establish the model’s quality.

4.1 Measurement model

As seen from Table 2 each construct has Composite reliability (CR) that is above 0.7 suggested by Nunnally (1978), also the Average variance extracted (AVE) is above 0.5 as suggested by Fornell and Lacker (1981). As seen from Table 1 the loadings are achieved having removed some items that did not load properly. Is more preferable to have few best indicator which is in line with (Hayduk & Littvay, 2012). In addition, discriminant validity is achieved between the dimensions as evidenced by comparing the square root of the AVE with the correlations among constructs (Fornell & Larcker, 1981). The results showed in Table 3 the square root of the AVE for each component is greater than the correlation between components, proving adequate discriminant validity.

Table 1: Factorloading and Crossloading

	CFC-F	CFC-I	CL
CFCF1	0.8807	0.0649	-0.039
CFCF2	0.8789	0.0418	-0.0238
CFCF5	0.7799	0.0775	-0.0382
CFCI2	0.1938	0.7063	0.3417

CFCI3	0.0551	0.6164	0.2668
CFCI6	0.0305	0.7660	0.4314
CFCI7	-0.0590	0.7297	0.3310
CL12	-0.0407	0.3175	0.7481
CL13	-0.0351	0.3229	0.7416
CL8	-0.0184	0.4188	0.6961

Bold values are loadings for items which are above the recommended value of 0.5.

Table 2: Convergent and reliability analysis

Variable s	Item Loadings	CR	AVE
CFCF	0.8807	0.88	0.72
	0.8789		
	0.7799		
CFCI	0.7063	0.79	0.5
	0.6164		
	0.7660		
	0.7297		
CL	0.7481	0.77	0.53
	0.7416		
	0.6961		

CR= Composite reliability AVE= Average variance extracted

Table 3: Discriminant Validity

Constructs	1	2	3
CFC-F	0.8478		
CFC-I	0.0762	0.7067	
CL	-0.0417	0.4946	0.7289

Diagonals (in bold) represent the average variance extracted while the other entries represent the squared correlations

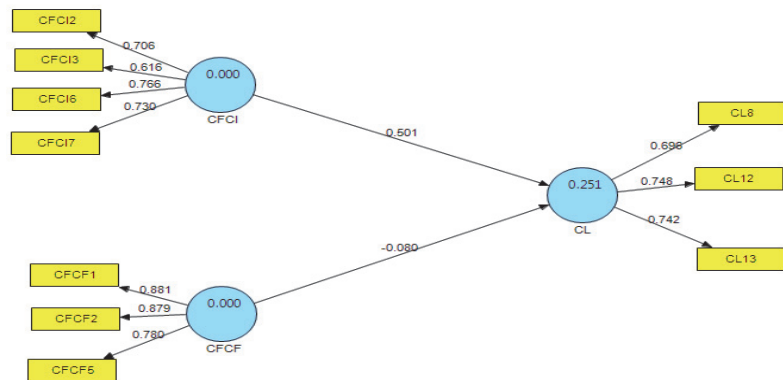


Figure 1: PLS Algorithm

Figure one revealed the items loading and values of the beta for the variables. With regards to R-squared values, the model explains 25% of the total variance in cyberloafing behavior, suggesting that CFC-immediate and CFC-future collectively explain 25% of the variance of cyberloafing behavior. This is considered acceptable based on the recommendation as Falk and Miller (1992) that 10% as acceptable R-squared value.

4.2 The Inner Model

Table 4: Result of inner model

	β	SE	T Value	P value
CFCF $\rightarrow$ CL	-0.080	0.084	0.950	0.088
CFCI $\rightarrow$ CL	0.501	0.064	7.810	0.008**

β = BetaSE= Standard Error ** $p < 0.05$

From table 4 above, the result of the inner model shows that one out of two direct relationships is supported. Hypothesis 2 which states that there is a positive relationship between CFC-I and cyberloafing H2 ($\beta = 0.501$, $t=7.8010$, $P<0.008$) is accepted. However hypothesis H1 which implies that ($\beta = -0.080$, $t=0.950$, $P<0.088$) is not supported.

5. DISCUSSION

The objective of this paper was to investigate the role of the personality variable CFC in predicting employee cyberloafing behavior. In achieving our objectives, we tested two hypotheses but one out of the two was accepted. The accepted

hypothesis states a positive relationship between CFC-I. This result agrees with previous studies (eg., Zhang et al., 2015) that employees low in CFC tend to have more cyberloafing behaviors during their work time. The other hypothesis which states a negative relationship between CFC-F and cyberloafing is rejected (Adams, 2012; Hamilton, Kives, Micevski, & Grace, 2003; Joireman et al., 2008). As opined by Joireman et al. studies need to be more concerned CFC-I rather than CFC-F as CFC-I is regarded as a stronger predictor of individual behaviors than a CFC-F. Overall, the results seem to be consistent with construal level theory that people construe distant future events using abstract representations or choosing their behavior thinking only about immediate events using concrete term (Trope & Liberman, 2010). The model tested suggests as expected that consideration of future consequences immediate (CFC-I) positively predicts cyberloafing and there is negative relationship between consideration of future consequences future (CFC-F) and cyberloafing behavior but the relationship is not statistically significant.

The finding is significant to individuals, organizations and the entire country's economy. First, the finding that CFC was negatively related to cyberloafing behavior proves that this construct plays an important part in affecting employee behaviors in the organization. The result can aid organizations to detect workers who are likely to engage in cyberloafing behavior by selecting the appropriate candidate during recruitment process. The result will also help the country to have sustainable and productive private and public sector employee.

6. LIMITATIONS AND DIRECTIONS FOR FUTURE RESEARCH

This study is a cross-sectional, therefore no causal inference that can be made from the population in interpreting this result. Thus, future study is required to use a longitudinal design. Also future study can use larger sample as this study was conducted using small sample. Also future study can test this variable in various work setting using paper and pencil method as this study collected the responses online (Sheikh, Atashgah, & Adibzadegan, 2015). Other personality variables influencing cyberloafing behaviors and are worthy of further research (Sheikh et al., 2015).

7. CONCLUSION

This paper proves significance of individual differences in CFC in understanding cyberloafing behavior and likewise the predictive usefulness of a two-factor CFC model. We also presented that the CFC-I was mainly vital in the prediction of cyberloafing behavior. These findings suggest that if managers are aware of these cyberloafing antecedents, i.e CFC, they can set special policies regarding employee recruitment and towards the fulfillment of organizational goals.

Additionally, organization should employ training to help employees to become aware about the importance of future consequences of their cyberloafing actions on the performance of the organizations.

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