# Mediating Effect of Psychosocial Safety Climate and Job Resources in the Job Demands-Health Relation: Implications for Contemporary Business Management

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**ABSTRACT:-** The ojective of this study was to investigate the mediating effect of psychosocial safety climate (PSC) and job resources (JR) on the relationship between job demands (JD) and health of the fuel customer attendants in Accra. A sample of 876 fuel attendants from the four biggest Oil Marketing Companies (OMCs) in Ghana was studied using a questionnaire developed from three pre-existing instruments for data collection. The composite reliabilities scales on the questionnaire yielded between .86 and .95. Patial Least Squares-Structural Equation Modeling (PLS-SEM) was the analysis tools used. The results revealed a statistically significant direct effect of JD on health status of the attendants both in the initial (t = 45.15, p < .001) and complete (t = 39.16, p < .001) models when bootstrapping procedure was applied. PSC and JR provided partial mediation to the effect of JD on state of health of the attendants. Fuel station work environment had adverse effects on the well-being of the attendants. Implications on business growth and sustannability in the  $21^{st}$  century business environment, and the role of supervisors' support for worker health and safety as comtemporary business model are discussed.

**Keywords:** business growth and sustainability, job demands, job resources, mediating effect, psychosocial safety climate.

# I. INTRODUCTION

Workplace health and safety is a "big driver" to productivity, business growth and sustainanbility in comtemporary organisations. It is a multidisciplinary field concerned with safeguarding the safety, health, and well-being of individuals who are engaged in some form of professional or non-professional occupation. Therefore, it has become a global concern with continuous analyses and enhancement, supported by legislature (Elsler, 2007). Countries like England, Denmark, and Italy have comprehensive measures and legislations to guarantee occupational safety (Elsler, 2007). However, countries like Ghana have only statutory provisions in support of health and safety procedures in the workplaces (Ghana Labour Act (Act 651), 2003). The Labour Act (2003), (Act 651 Article 118:1) of Ghana makes it obligatory for each organisation or employer to "ensure that every worker employed in Ghana works under satisfactory, safe, and healthy conditions" at their workplace, regardless of the workplace. International organisations including the International Labour Organisation (ILO) and WHO also have stressed the fact that safeguarding employee against job-related danger and harm is a necessary human right, irrespective of the nature of work (ILO, 2017). There are key determinants of occupational safety of workers (Colémont, & Van den Broucke, 2008) and paramount amongst them is job demand.

Job demands are the entire physical, psychological, social or organisational facets of a job that oblige constant physical and psychological effort (Schaufeli & Bakker, 2004). A job demand could result in both positive and negative consequences contingent on the demand itself as well as on the individual's capability to deal with it. Job demands have been acknowledged as part of the utmost sources of occupational stress (MacDonald, 2003). However, motivation, stimulation or work satisfaction may be positive responses whereas depression, anxiety or burnout, the negatives (Adil & Baig, 2018). Thus, prolonged working hours, high time pressure, ergonomic issues, and unfavorable physical conditions have increased risk of stress and negative long-term effects on workers. In general, there are four types of job demands: quantitative demands (e.g. volume of work), mental demand that impact the cognition and information processing, emotional demands which are primarily associated to the effort required to deal with desired emotions throughout interpersonal transactions, and physical demands, primarily associated with the musculoskeletal system, either the physical aspects of behaviour (Dollard & Bakker, 2010).

Various studies have tried to establish a link between job demand and health and safety. Schaufeli and Bakker (2004) found that job demand had a significant predictive effect on burnout which in turn affects the health and safety, and turnover intentions of employees sampled from different professional fields. Again, Nahrgang, Morgeson and Hofmann's (2011) meta-analytic study found that job demands such as task complexity impair employees' health and positively relate to burnout. Moreover, in a more recent study by Leitão, McCarthy and Greiner (2018), the association between job demand and health and safety of workers was also confirmed. Alhought previous research reteriates the association between job demand and employee health and safety, the role of other factors such as psychosocial safety climate (PSC) in this relationship cannot be completely overruled.

Psychosocial safety climate (PSC) embodies the role of employers and the philosophy of job-related stress, and employers' ability to focus on the psychological well-being of employees against output requirements of the organisation (Dollard, 2018; 2012). It encompasses organisational policies, procedures, and activities taken for protecting workers' psychological health and safety (Dollard & Bakker, 2010). Therefore, PSC creates an environment for psychological health and safety of employee, and includes four related principles: employers commitment for averting stress in employees, priority of employers on employees' psychological health and safety over productivity, bi-directional organisational communication in health and safety matters, and lastly, the level of involvement by managers and workers in health and safety (Dollard, 2012; Hall, Dollard, & Coward, 2010). In high PSC, employers are mindful that increased job demands affect the health of workers (Bailey, Dollard & Richards, 2015). Hence, PSC guides employers to make work demands more malleable for employees by making resources as well as incentives available to make work conditions more bearable. This shows that employees' health is emphasised as equally or more significant than production output (Hall et al., 2010). It also likely to promote increase in job resources.

Job resources is also another factor that influences the existing relationship between job demands and occupational health and safey. Job resources are seen as the physical, psychological, social or organisational components of a job that are beneficial in achieving work-related objectives, decreasing job demands and the related physiological and psychological impact, encouraging individual growth, learning, and advancement (Bakker & Demerouti, 2017). Job resources have been found to play a double role in employee well-being by first aiding employees to deal effectively with job demands, moderating the negative effect of job strain on health, and second, the availability of job resources facilitate goal attainment to enhance employee motivation, work engagement, and performance (Bakker & Demerouti, 2017).

Several studies have found that the unfavourable consequence of job demands like anxiety on psychological health is reduced when PSC is high (Law et al., 2011; Hall et al., 2013). Additionaly, high PSC is an effective organisational antecedent that lowers job demands and psychological health effects and promotes physical safety climate, team psychological climate, perceived organisational support (Eisenberger et al., 2001) as well as negatively predicts depression and exhaustion among employees. Similarly, job resources play a buffering role (where an increase in PSC would decrease the effect of job demand on employee health) in the impact of job demand on employee's health in general. A critical review reveals that previous research only examined the independent moderating roles of PSC and job resources in the relationship between job demand and employee's health. Again, the combine effect of PSC and job resource in the association between job demands and employee health and safety in general does not exist in the literature. Therefore, the aim of this study was to: (i) examine the direct effect of job demands on health and safety, job resource, and PSC, (ii) examine the direct effect of PSC on health and safety, (iii) assess the direct effect of job resources on employee health and safety, (iv) test the indirect effect of job demand on employee health and safety through PSC, and (v) explore if job resource significantly mediates the relationship beteen job demand and health and safety of fuel customer attendants from four major Oil Marketing Companies (OMCs), in Ghana.

# II. METHODS

#### 2.1 Design and participants' selection

Participants were 876 conveniently sampled fuel customer attendants from four major Oil Marketing Companies (OMCS) in Accra, Ghana. They represent about 15% of the total population (5740). For organisational occuaptional health and safety issues, 15.3% of the population is deemed adequate (Dollard & Bakker, 2010; Dollard et al., 2012ab; Idris et al., 2011). This sample included 56% (n = 492) male and 45% (n = 384) female attendants, with their age range being 15-66 years (M = 28, SD = 6.5). They included 49% (n = 426) forecourt attendants, 28% (n = 245) shop attendants and 23% (n = 205) lube bay mechanics. The working experiences of the attendants range from < 1 year -  $\geq 21$  years. Besides, 13% (n = 115) of attendants either had no formal education or had only basic education, 10% (n = 83) completed vocational education, 67% (n = 588) secondary education and 10% (n = 88), tertiary level education. About 23% (n = 198) of the attendants reported having sustained injuries at their stations while 77% (n = 678) did not. Specifically, 13% (n = 112) had had

vehicle accidents, 31% (n = 267) reported regular customer verbal abuses, 10% (n = 83) fire outbreaks, 4% (n = 37), armed robbery, and 3% (n = 29) major oil spillages.

The Institutional Review Board of the University of Cape Coast gave ethical approval for the study. In addition, participants were assured of their information confidentiality and that participation in the study was completely voluntary. They further signed informed consent form before taking part in research.

#### 2.2 MEASURES

All measures were one-time survey which used a questionnaire. The questionnaire items were derieved from PSC-12 (Hall et al., 2010). Job demand-resource scale (Jackson & Rothmann, 2005) which measured job resources and job demands, and Short-Form Health Survey was used to measure health status (Ware, Kosinski & Keller, 1996). PSC-12 questionnaire measured four areas of oragnisational climate. The instrument also solicited participants' socio-demographic information such as age, gender, working department and experience, educational status, injury and incidents rates.

PSC-12 measured four key components with 12 items: (1) senior management commitment and involvement stress prevention practices, (4 items, such as "Senior management show support for stress prevention through involvement and commitment"), (2) priority given to psychological health compared with productivity goals, (4 items, "Senior management considers employee health and safety to be as important as productivity") (3) organisational communication encompasses opportunities for the workers to provide feedback on their health and well-being (4 items, "Management listens to my contributions to resolve health and safety problems in this station or company"), and (4) organisational participation relates to consultation with employees, their unions and health and safety representatives on matters regarding health and safety at the workplace ("Consultation in health and safety occurs with workers in my workplace"). Participants responded to a 4-point Likert scale of strongly disagree (1) to strongly agree (4), with higher PSC score coresponding to better organisational safety climate.

Job resource was measured with eight items such as "My supervisor is concerned about the welfare of those who work under him/her" and the co-worker support "My colleagues will help me when I need them". In addition, 12 items measured job demands; physical demands ("My job requires moving heavy load"), with 6 items, and emotional demands ("I am faced with conflicting job demands at work all the time"), 6 items. Attendants answered to a 4-point Likert-type scale of strongly disagree (1) to strongly agree (4), with higher scores meaning better level of job resources and adverse job demands (Jackson & Rothmann, 2005).

Self-reported health status of the fuel customer attendants was assessed with 9 item Short Form Health Survey. With a 5-point scale, the items assessed health on a four week interval; ("During the past 4 weeks, how much difficulty did you have doing your daily work at home or at work, because of your physical health?", "During the past 4 weeks, how much did personal or emotional problems keep you from doing your usual work?"). The psychometric properties of these intruments are high and acceptable across cultures and populations (Bakker & Demerouti, 2017; Hall et al., 2010; Ware Jr, Kosinski & Keller, 1996). Moreover, the current instrument yielded high valid and reliable data, e.g. composite reliability values of PSC = .95, job resources = .86, job demands = .95, and health = .91. Furthermore, the four constructs recorded high and acceptable convergent validity scores, e.g. PSC = .63, job resources = .50, job demands = .71, and health status = 0.61.

#### 2.3 DATA ANALYSIS

SEM-PLS was used to test the mediating effect of job resources and PSC on job demands and health and safety relation among the fuel station attendants. First, a direct effect of job demands on health and safety was tested using a partial model containing job demands and health and safety. Second, a complete model of job demands as the predictor variable or the exogenous latent variable, with job resources and PSC as mediators, and health and safety acts as the criterion or the endogenous latent variable (see Model 1) was built and tested. The suitability of the models (complete) was assessed by the indictor reliability, which is the measurement model. Further, bootstrapping was applied to test the significance of the path coefficients. The measurement model (complete model) was evaluated with convergent validity using AVE, composite reliability, discriminant validity on a criterion of Fornell and Larcker (1981) and the extent of construct collinearity with VIF (Fassott et al., 2016).

### 2.4 RESULTS

The indicator outer loadings suggested that the items loaded highest to their respective latent variables than they did on others (see Table 1). Some items with outer loadings less than 0.5 were deleted from the initially specified complete model. They included items 3, 5, 7, 9 and 12 from job demands, item 1 from job resources and item 6 from health and safety. The re-specified model (complete) yielded acceptable loadings or

values that ranged from 0.67 to 0.84 for PSC, 0.70 to 0.90 for job demands, 0.63 to 0.78 for job resources, and 0.55 to 0.88 for health (see Table 1, Model 1-apendices).

TABLE 1: Summary of the Results of Reflective Measurement Model

Latent Variables (LV)	Indicators	Loadings	Composite Reliability	AVE	VIF
Health and Safety			0.913	0.605	
	Heal1	0.771			
	Heal2	0.844			
	Heal3	0.549			
	Heal4	0.890			
	Heal5	0.730			
	Heal7	0.880			
	Heal8	0.727			
Job Demands			0.945	0.714	1.01
	Job Demands1	0.818			
	Job Demands2	0.890			
	Job Demands4	0.901			
	Job Demands6	0.700			
	Job Demands8	0.855			
	Job Demands10	0.862			
	Job Demands11	0.871			
Job Resources			0.862	0.503	1.07
	Job Resources2	0.626			
	Job Resources3	0.629			
	Job Resources4	0.642			
	Job Resources5	0.754			
	Job Resources6	0.734			
	Job Resources7	0.776			
	Job Resources8	0.781			
PSC			0.953	0.631	1.07
	PSC1	0.788			
	PSC2	0.734			
	PSC3	0.803			
	PSC4	0.668			
	PSC5	0.828			
	PSC6	0.862			
	PSC7	0.804			
	PSC8	0.783			
	PSC9	0.819			
	PSC10	0.826			
	PSC11	0.831			
	PSC12	0.767			

The structural model (complete) achieved a good fit; SRMR = 0.08, the criterion being  $\leq 0.08$ , and converged at 7th iteration, maximum 300 (Hair et al, 2014; Fassott et al., 2016). Further PLS-SEM results indicated that constructs were reliable, ranging from 0.86 to 0.95 (see Table 1 above). The constructs also converged adequately, health = 0.61, job demands = 0.71, job resources = 0.50 and PSC = 0.63, acceptable cutoff point being  $\geq 0.50$ . The VIF values of job demands = 1.01, job resources = 1.07 and PSC = 1.07 also indicated no collinearity problem among predictor variable (see Table 1). The results further showed that the inner model's discriminant validity was met (Fornell & Larcker, 1981; Wong, 2013). This is because the square root of AVE for health, job demands, job resources and PSC are larger than their corresponding latent variable correlations (see Table 2).

TABLE 2: Discriminant Validity for the Complete Model using Fornell and Larcker (1981) Criterion

				( )
Latent Variable	H&S	JD	JR	PSC
H&S	0.78			
JD	0.65	0.85		
JR	0.13	0.03	0.71	
PSC	0.16	0.06	0.25	0.79

PLS-SEM results further showed that job demands independelty accounted for 43% ( $R^2 = 0.43$ ) of the variance in the health status of the attendants in the initial model. Moreover, variance explained in the health by the job demands, job resources, and PSC increased to about 45% ( $R^2 = 0.45$ ) in the complete model. However, the path coefficient between job demands and health in the initial model (0.66) was reduced to 0.63 when job resources and PSC were introduced into the model. The paths' strength also revealed that the strongest path in the complete model is that of job demands  $\rightarrow$  health (0.63) followed by PSC  $\rightarrow$  health (0.15) and job resources  $\rightarrow$  health (see Table 3).

The mediation test indicated a significant direct effect of job demands on health (t = 45.15, p < .001), when a bootstrapping procedure was applied to the initial model. The direct effect was still significant but reduced in the complete model (t = 39.16, p < .001) when we introduced PSC and job resources into the model. Though there is reduction in the strength and significance of the influence of job demands on health, from initial to complete models' direct effect, an evaluation of indirect paths (job demands  $\rightarrow$  PSC  $\rightarrow$  health and job demands  $\rightarrow$  job resources  $\rightarrow$  health and safety) is needed to conclude mediation. The two indirect paths also showed significant (job demands  $\rightarrow$  PSC  $\rightarrow$  health = 7.64 and job demands  $\rightarrow$  job resources  $\rightarrow$  health and safety = 5.31) in the complete model (Table 3, Model 2,). Therefore, because the job demands still has a significant effect on health in the presence of job resources and PSC, job resources and PSC become partial mediators of the effect of job demands on health (Nitzl et al., 2016) among the fuel station attendants. The theory of PSC, therefore, tentatively holds and that the effect of job demands on health outcome variables of the attendants would be reduced in when PSC and job resources are increased.

TABLE 3: The Mediating Effect of Job Resources and PSC on the Effect of Job Demands on Health and Safety

Barety			
Paths	Path Coef. (β)	t-values	p-values
Initial Model			
Direct Effect			
Job Demands → Health and Safety	-0.65	45.15	0.00
Complete Model			
Direct Effect			
Job Demands → Health and Safety	-0.63	39.16	0.00
Job Demands → Job Resources	0.03	0.93	0.35
Job Demands → PSC	-0.06	1.61	0.11
PSC→ Health and Safety	0.15	6.03	0.00
Job Resources → Health and Safety	0.15	4.38	0.00
Indirect Effect			
Job Demands → PSC → Health and Safety			
Job Demands → Job Resources → Health and Safety	7.64		
	5.31		

#### III. DISCUSSION

The finding suggests partial mediation roles of PSC and job resources in the influence of job demands on health and safety of the attedants. The significant effect of job demands on health and safety in the presence of job resources and PSC is an indication of the strong effects fuel station jobs have on the health, safety and well-being of these attendants. PSC and job resources are two ameliorating organisational factors whose high presence at the workplace is supposed to leverage the negative effects of the various work demands on the workers (Kouabenan et al., 2015; Winwood, Stevens & Bowden, 2015).

PSC, for instance, is observed to be a 'cause of cause' (Dollard et al., 2012b). First, PSC serves as a precursor, giving birth to favourable supervisor-employee relations and among co-workers. It further strengthens the effectiveness of such cooperation in the organisation. Second, PSC prevents the telling effects of work psychological and physical demands on the workers and their health and safety (Winwood et al., 2015). The high presence of supervisor-worker relationship is mostly in opposition to the negative impacts of job on the well-being of the worker. Moreover, evidence revealed that positive interactions among workers provide buffer for health outcomes of the typical employee (Okoye, & Aderibigbe, 2014). It is expected in the fuel station industry where there is positive organisational safety climate, coupled with a good supervisor-supervisee and co-worker relations, that the negative effects of the high job strains on the health and safety of the attendants would be reduced to give way to increase level of daily sales.

The positive influence of PSC and job resources on the effects job demands on health and safety found in this current study is expected, as many early scholars have pointed to the same (Garrick et al., 2014; McTernan, Dollard & LaMontagne, 2013). Every work comes with some amount of demands. However, high

monotonous, customer service and physically demanding jobs like those at fuel stations require high PSC and job resources to lower job strains and raise productivity. These factors would help accommodate the effects of such unfavourablework conditions on health and safety of the fuel station attendants (Bailey et al., 2015). In support of this, Dollard and Bakker (2010), through their longitudinal study, found among groups of Australian workers that high workplace PSC lowered the effects of emotional demands, work pressure, and increased skill discretion. The observations of Bond, Tuckey and Dollard (2010) further show that PSC at high levels provide ameliorating effect to bullying and harassment on posttraumatic worksite stress disorders in Australian security services. At fuel stations where safety climate is low, bullying and harassment may be high that significantly raise the weight of job demands and lower the health outcome variables of the attendants. Thus, in such competitive business environment where every OMC and their outlets try to increase their customer base, companies recording lower PSC and job resources risk losing their customers and decrease their market share, threatening the growth and sustainability of the business.

At fuel service stations where there are high job demands, it is the ability of the senior managers to create a conducive safety climate that protects the well-being of the attendants. Senior management's ability to safeguard the health and safety of these attendants may resonate in the provision of necessary human and material resources for work (Dollard, & McTernan, 2011). These resources may have to adequate safety facilities, appropriate PPE, devices and giving workers a sense of job security (Ansah, & Mintah, 2012). Fuel station job demands include long working on the feet, dealing with many customers, working with petroleum vapour, and having to cope with high job insecurity (Monney et al., 2015). In this case, the detrimental effect of job demands on health and safety of the attendants could be controlled by the presence of high-level PSC. Besides, PSC further increases the availability of material job resources that promote safe work procedures (Law et al., 2011). In a similar vein, Law et al. showed the mediation function of PSC where it acts as a higher-level support variable by providing for peer support. It further provides a conducive worker context where workers feel comfortable utilising available resources to cope with work demands (Dallard et al., 2012ab).

Organisational PSC is a management-driven concept that culminates into workplace safety policies, practices, and procedures for the protection of worker health and safety (Dollard et al., 2012b; Idris et al., 2012). At the fuel station where there is high level of PSC, managers would take cognisance of risk factors associated with the job. These managers would help to shape jobs where demands are manageable and resources adequately provided. However, at low organisational PSC, attendants are going to experience high job demands including emotional demands and physical demands. However, this relationship could be offset when there are adequate job resources, which are influenced largely by the organisational context produced through senior managers' safety concerns. Using a hierarchical linear modeling, Dollard et al. (2012b) observed among Australian police officers that the presence of high PSC lowered the positive relationship between emotional demands and increase in distress among the workgroups. They further revealed that high emotional resources also brought about a reduction in the positive effect high job demands had on stress level of the workers. Thus, among fuel station attendants, the presence of positive PSC would become stress risk ameliorating factor, providing a buffering effects to health of the attendants from the adverse of job demands (Idris et al., 2012).

Perhaps, the high demands of fuel station job are creating job dissatisfaction, absenteeism, and presenteeism, psychological distress, emotional exhaustion, and impair the physical health status of the attendants. However, Nel et al. (2015) found job satisfaction to be a significant factor predicting safety at work. For instance, an attendant who perceives positive supervisor and co-worker support is equally likely to experience job satisfaction, low job emotional, and physical demands, bullying and harassment (Okoye, & Aderibigbe, 2014). On the contrary, a lesser perceived supervisor and co-worker support could lead to a burden of high emotional and physical demands (Azma et al., 2013). That is, though there may be high job demands present at the fuel stations and attendants experiencing the effects, a supervisor-attendant, attendant-attendant conducive environment is most likely to mitigate such effects (Dollard et al., 2014; 2012b), and produce positive customer interaction that yields growth in sales of the stations.

The roles of the fuel station supervisors result in a stronger relationship between them and the attendants that reduces the negative impacts of work on the attendants (Kumako, & Asumeng, 2013). Moreover, organisational safety climate can be created by line project managers who are the immediate leaders. In such workplaces, safety climate perception would be high (Dollard et al., 2012), thereby reducing the weight of daily job demands on the worker (Nguyen et al., 2017). A similar study by Kouabenan and colleagues (2015) reiterated the supervisors' role in affecting safety climate perception when they found that first-line managers' encouragement was more influential on safety climate perception than that of senior management views. Besides, such climate did not only reduce the perceived burden of work but also affected the health outcome variables of the workers. However, Yang et al. (2016) found among large and diverse US workers that younger employees and those with average-poor health, co-worker support did not significantly affect job stress. In effect, a congenial workplace becomes imperative for such positive workplace interactions to apparently influence health and safety of the workers (Tuckey et al., 2009), and increase the propensity for business

sustainability. Therefore, in the competitive contemporary business environment like Ghana's downstream oil industries, OMCs and their outlets cannot afford to neglect the health and safety needs of the customer service attendants if these companies want to increase their customer base and capture reasonable market share, for growth and sustainable business future.

# IV. CONCLUSIONS

Contemporary businesses cannot ignore the safety of their workers if business growth and sustainability are to be achieved. The health and safety status of the attendants is a direct product of the level of fuel station's PSC, support attendants receive from their supervisors and horizontal support while at work. The interactions between supervisors and attendants and among the attendants at fuel stations are inadequate but increase in such interactions are important to protecting the attendants from the ill effects of their job routines. The workload and routines work at fuel service stations are having a serious health and safety effects on the attendants. However, these challenges can be effectively prevented and/or reduced by increasing PSC and raising the support supervisors provide to attendants. Besides, management efforts are the most essential element to reducing the effects of workload on the health and safety of these attendants. The levels of organisational safety climate created by the senior managers through their commitment and priority, participation and communication of health and safety directly and indirectly influence the state of health and safety of the attendants. Therefore, job resources and PSC become partial mediators of the effect of job demands on health among the attendants. The theory of PSC, therefore, tentatively holds and that the effect of job demands on health outcome variables of the attendants would be reduced in when PSC and job resources are increased.

For business growth and sustainability, we encourage supervisors to increase their support for the attendants. Supervisors are the closest management staff and serve as the liaison officers between the senior managers and the attendants. Therefore, supervisors should be concerned about the welfare of the workers, listen to them, help them as they work and be the unifier by successfully bringing all the attendants to work together peacefully. The act of workers actively helping each other reduces the burden of job demands and promotes work cohesion; therefore, we encourage suppervisors and senior managers to promote the act of cooperative work among the atteandts. In such situations, the burden of job is reduced, morale is raised, promoting the sense of well-being among the attendants, which could translate into increased attendant-customer relation, for sustained customer base and increase market share. The OMCs need to view attendants' health and safety with business lense rather than just-a-matter-of workers' health and well-being.

## V. STRENGTHS AND LIMITATIONS

The study applied the most appropriate study methodology, mode of analysis, and statistical test tools. Since the study sought to determine the mediating effect of PSC and job resources in the association between job demands and employees' health, the use of path analysis using SEM was regarded as a rigorous and robust form of analysis, making the results and findings more dependable. Again, the quantitative nature of the study and the sample size used make it appropriate for findings of this study to be generalized to other places both in and outside the Ghanaian context. Nonetheless, the study has certain limitations based on the cross- sectional design. Self- reported measures used in the study can lead to measurement bias. However, the psychometric techniques applied have increased the objectivity and validity of the measures. Additionally, it is important to emphasize that the organizational factors investigated in this study are not exhaustive. The sample comprised attendants working in Accra which probably are very similar to the other fuel attendants in Ghana.

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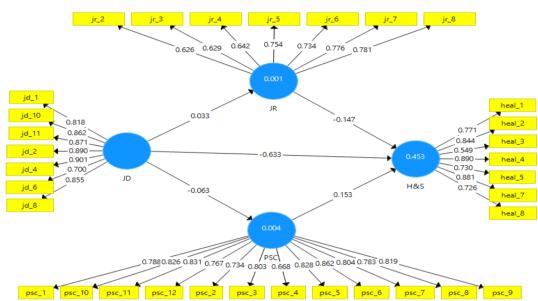
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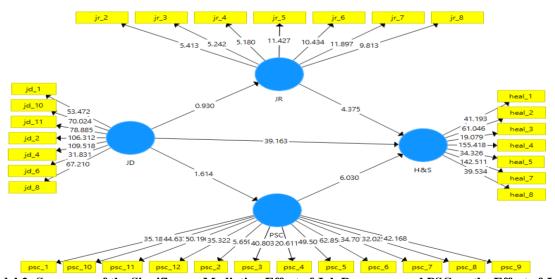
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### **APPENDICES**



Model 1: PLS-SEM Reflective Model Showing Indicator Reliability of PSC, Job Demands, Job Resources and Health and Safety



Model 2: Summary of the Significance Mediating Effect of Job Resources and PSC on the Effect of Job Demands on Health and Safety

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