

Drug abuse and suicidal thoughts among employees: an emerging economy perspective

The dark side
of work

Kwesi Amponsah-Tawiah

*Organisation and Human Resource Management, University of Ghana,
Accra, Ghana*

Joshua King Safo Lartey

School of Business, University of Wollongong, Wollongong, Australia, and

Abdul-Razak Suleman

School of Business and Law, Edith Cowan University, Joondalup, Australia

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Abstract

Purpose – Anchored with turbulence emanating from the COVID-19 pandemic, the work environment has become more stressful with debilitating effects on the well-being of employees. Employees rely on varying means of coping including drug abuse. However, the association between drug abuse and suicidal thoughts among employees in Ghana is unknown. Therefore, this study sought to examine the relationship between drug abuse and suicidal thoughts among employees in Ghana.

Design/methodology/approach – In a cross-sectional survey, this study purposively sampled 470 employees from three sectors of the Ghanaian economy (telecommunication, banking and manufacturing). The data was analysed using the multivariate analysis (MANOVA), Pearson's *r* test and hierarchical regression.

Findings – Analysis of data revealed a positive relationship between drug abuse and suicidal thoughts, indicating that drug abuse is a risk factor for suicidal thoughts. Besides, it was also revealed that banking sector employees have a higher risk of having suicidal thoughts than employees in the telecommunication and manufacturing sectors.

Practical implications – Managers of organisations need to redesign work to embrace the challenging circumstances brought about as a result of COVID-19 and post-COVID implications. The work environment needs to be more supportive to shield employees from the physical and emotional demands of work during and after this period of the COVID-19 pandemic. Today than ever, investment in the implementation of employee-assisted programmes (EAPs) and employee well-being programmes (EWP) to equip employees with the needed skills to cope with stressful conditions has been more than justified.

Originality/value – From a broader perspective, this study identifies drug abuse as a key risk factor for suicidal thoughts among employees, thereby highlighting the fact that smoking cessation programs and drug management therapies are an integral part of well-being programmes aimed at establishing equilibrium and gradually creating a wide gap between employees and suicidal thoughts.

Keywords Drug abuse, Suicidal thoughts, Employee well-being

Paper type Research paper

Introduction

Suicide prevention continues to be one of the thematic areas in public health and employee well-being literature (Mann *et al.*, 2005; World Health Organisation (WHO), 2012). Contrary to an increment in the efforts at suicide prevention, suicidal behaviours, including suicidal thoughts, have also been on the rise (Conway *et al.*, 2017); the condition continues to be the third leading cause of death among young adults (Omar, 2005; WHO, 2019). Global statistics show that over 800,000 people die as a result of suicide every year with about 75% occurring in low- and middle-income countries (LMICs) (Breet *et al.*, 2018). With the increasing trend of global suicide, international organisations including the World Health Organization (WHO) proposed to reduce the global rate of suicide by 10% in 2020 (WHO, 2014) even though unsuccessful. Recent literature on suicide has provided evidence of substance abuse as a risk



factor for suicidal behaviours (Breet *et al.*, 2018; Pompili *et al.*, 2012). Thus, even though there are no clear differences in the relative impact of varying risk factors on suicidal behaviours, drug abuse is found to be strongly related to suicidal risk (Voss *et al.*, 2013). The crux of this paper, therefore, focuses on examining the association between drug abuse and suicidal thoughts among employees.

Extant literature shows that substance abusers are six times more likely to engage in suicidal behaviours than their counterparts who are not substance abusers (Breet *et al.*, 2018). It must be acknowledged that although there is consistency in the association between substance abuse and suicidal behaviours, there is yet a majority of substance abusers who do not engage in suicidal behaviours (Paul *et al.*, 2015) which may be attributed to other factors such as one's level of psychopathology (Alcaro *et al.*, 2021; Cabib *et al.*, 2020). Therefore, it is crucial to consider other samples like employees rather than the general population to show the association between substance abuse and suicidal behaviour. Available statistics on workplace violence, including suicide and assaults, show that about 18% of all workplace occupational injuries are a result of workplace violence (Phillips, 2016). These statistics may even be understated due to the stigma associated with suicide (Germain, 2014). Thus, actual statistics are estimated to be 50–60% greater than the available statistics (Germain, 2014).

The psychological and physical demands of the work environment challenge the resourcefulness of employees as they get drained either physically or emotionally (Granter *et al.*, 2019). Accompanying the global pandemic of COVID-19, are new work schedules and challenges stressful in adapting (Mo *et al.*, 2020; Stogner *et al.*, 2020). When work duties are too demanding and stressful compared to the available resources, the individual may resort to varying coping mechanisms (Crawford *et al.*, 2010), including drug abuse (a predisposing factor to suicide) (Sinha, 2001; Bono *et al.*, 2013). Even though suicide cases are highly reported among some particular professions including the police (Mahon *et al.*, 2005), it must be acknowledged that suicide permeates various professions, industries and levels of organisation ranging from lower levels to top management (Germain, 2014). Nevertheless, there are dearth of empirical studies reporting on the correlates and/or antecedents of employee suicide, possibly due to the stigma attributed to the act (Follmer and Follmer, 2021; Germain, 2014). *Therefore, this study sought to examine the relationship between drug abuse and suicidal thoughts among employees in Ghana. It is worth noting that the uniqueness of the present study lies in the use of three varying samples of employees (manufacturing, banking and telecommunication), the context of the study (sub-Saharan Africa) and the theory used (the shattered assumptions theory).*

Literature (theoretical and empirical) review

The shattered assumption theory

The theoretical underpinning of the study is the shattered assumption theory by Janoff-Bulman (1992). The basic tenet of the theory is that individuals develop fundamental, yet unarticulated, assumptions about the world and themselves that allow for healthy human functioning (Park *et al.*, 2012). Thus, the theory assumes that an individual holds a belief in a just, benevolent, predictable world in which the individual possesses the competence and worth (Park *et al.*, 2012). However, when individuals encounter events that damage their worldview (i.e. traumatic material that cannot be easily integrated with previously held worldviews), they no longer perceive the world as benevolent and predictable or themselves as competent and invulnerable (Edmondson *et al.*, 2011). Consequentially, the subsequent state of defenceless, terrifying and confusing awareness of personal vulnerability gives rise to anxiety and physiological reactivity. Importantly, it is not only that worldviews are undermined, but that individuals become intensely aware of their mortality when those beliefs are stripped away (Edmondson *et al.*, 2011; Janoff-Bulman, 2010; Park *et al.*, 2012). In

line with the present study, the global pandemic caused by COVID-19 has led to a high level of job insecurities and work–life imbalance. The work–life imbalances and job insecurities caused by this global pandemic challenges the individuals' thoughts; they begin to see themselves incompetent and vulnerable. This mental trauma, overtime, leads employees to engage in maladaptive behaviours such as drug abuse. The indulgence in drug abuse is identified as a risk factor for suicidal thoughts.

An empirical review of related studies

The extant literature on drug abuse and suicidal thoughts among employees is at an embryonic stage. In one of the empirical studies conducted by [Boccio and Macari \(2014\)](#), the researchers attempted to establish the significant role of managers in reducing the risk of suicidal behaviour among employees. The researchers pointed out the association between negative work conditions and suicidal behaviours as well as related mental health. Out of the safe haven model (SHM) developed by the researchers, the study pointed out the significant role of creating a positive and supportive work environment, increasing the awareness of risk factors for suicide and promoting the utilisation of mental health support services as key resourceful factors to help reduce the likelihood of employee suicide. In another empirical study, [Lee *et al.* \(2017\)](#) examined the roles mental well-being and substance abuse play on suicidal behaviours. Analysed data disclosed adults who are drug abusers have a high tendency to engage in suicidal behaviours than adults who are not drug abusers. Besides, the study revealed a significant relationship between anxiety and suicidal behaviours. The findings suggest the crucial roles of substance abuse and mental well-being in explaining suicidal behaviours of adults.

In a retrospective study, [Voulgaris *et al.* \(2019\)](#) looked at the deaths in jail over a period of six years (2012–2017). Data from the Berlin jail system, the prison hospital, the State Institute for Forensic and Social Medicine Berlin and the Institute of Legal Medicine and Forensic Sciences at Charité Medical University Berlin were gathered for each death. In total, 33 convicts passed away overall throughout the time of investigation, 24 of whom committed suicide. Despite no evidence of lethal intoxication, forensic toxicology findings for drugs were positive in 25% of the suicide cases.

In another empirical study by [Nosratabadi and Halvaiepour \(2016\)](#) aimed at investigating the structural analysis of the links between depression, substance misuse, social support and the risk of suicidal ideation among Iranian military medical university students. Using randomly stratified sampling, a sample of 176 soldiers from three units was chosen. Of the total individuals, 28.4% had suicide thoughts, and 65.3% had depression to varying degrees (mild to severe). Social support and suicidal ideation had a strong negative connection, according to research ($p < 0.05$). Drug addiction and suicide thoughts were shown to be most closely associated.

Alcohol use disorder (AUD) has been linked to both completed and attempted suicide in a number of studies. Accordingly, the empirical reviews about the risk of suicide connected to AUDs in both developed and developing nations were revised by [Martinotti *et al.* \(2014\)](#). Alcohol abuse is a substantial risk factor for all sorts of suicidal behaviour, according to the research, which was done on a final selection of 76 scientific studies. Given its depressogenic effects, alcohol can be viewed as both a predisposing factor and a precipitating factor for the increased impulsiveness in drunk patients. The conclusion drawn from this analysis is that doctors should be aware that suicide behaviour is frequent in alcoholics.

[Al-Sharqi *et al.* \(2012\)](#) conducted a cross-sectional study to determine the prevalence and correlates of self-harming behaviour in patients with alcohol or drug abuse problems. The results revealed that 50.7% of respondents had experienced suicidal thoughts, while 6.9% engaged in self-harming behaviour without intending to die. Of the respondents, 13.1%

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reported engaging in any suicidal or harmful activity and 71.3% of respondents overall said they had experienced any recent unpleasant activating events. Observed associations were despondency (60.7%), feeling like a burden to family (29.5%), ignoring a safety plan (26.1%) and sexual abuse (11%), in addition to any treatment histories. On the other hand, the majority of respondents (92%) approved spirituality (92%) and reasons for living (64.9%) as protective factors.

A summary of estimates of the risk of suicide behaviour (ideation, plan and attempt) among people with substance use disorders in the general population was provided by [Borges and Loera \(2010\)](#). AUDs were linked to higher odds ratios (ORs) of ideation (range 2.0–2.5) and attempt (2.6–3.7), whereas substance use disorders were linked to higher ORs of ideation (2.3–3.0) and attempt (2.6–3.7). (2.0–4.0). The OR for drug use disorders ranged from 1.9 to 3.7 for ideation and 3.0 for attempt, according to follow-up studies of general population samples. With an OR of 1.5, alcohol abuse increased suicidal thoughts. ORs for those who drank alcohol before attempting suicide ranged from 6.2 to 9.6.

[Wu et al. \(2004\)](#) examined the relationship between teenage substance use/abuse and suicidal behaviours using data from a population sample of youth (N = 1,458; ages 9–17). Abuse and reliance on alcohol were substantially linked to suicide attempts, followed by heavy cigarette smoking. Even after adjusting for depression, the relationships were still substantial. After adjusting for depression, the links between substance use or abuse and suicidal ideation were no longer significant. The significance of substance use in teenage suicide behaviour is shown by these studies.

In their 2011 study, Vijayakumar, Kumar and Vijayakumar examined the link between substance use and juvenile suicide. According to data from the study, AUDs are a distal risk factor for both attempted and successful suicide. The usage of alcohol during the suicide attempt is linked to low-risk techniques. Recent studies have focused on the use of various drugs as a catalyst for suicidal behaviour, but more research is needed to understand the circumstances that lead to the act and the direct role that drugs play in suicidal behaviour. The use of cocaine and inhalants is strongly linked to suicidal behaviour. The risk is higher for young individuals who engage in various risky behaviours, such as substance abuse and unsafe sexual behaviour. In a systematic review conducted by [Woo and Postolache \(2008\)](#) on the impact of occupational factors on mood disorders and suicide, it was revealed that there is a predictive association between occupational variables and suicide. Further, due to the low awareness and social stigma associated with suicide, employees are unwilling to access interventions and healthcare.

In another systematic review conducted by [Breet et al. \(2018\)](#) on the relationship between substance abuse and suicidal ideation and behaviour (SIB) in LMICs, it was uncovered that there is a consistent positive relationship between all substance use (i.e. alcohol, tobacco, cannabis, illicit drugs and the nonmedical use of prescription drugs), substance use dimensions (i.e. intoxication, use and pathological use) and suicidal ideations and behaviours. Findings from this study cement the fact that substance use is a crucial risk factor for suicidal behaviours; therefore, programmes designed to help reduce the consumption, abuse and negative use of substances in LMICs are vital for suicide prevention.

Moreover, [Pompili et al. \(2012\)](#) also conducted a systematic review on the relationship between suicide and substance abuse among adolescents. The review revealed a significant association between substance abuse and suicide and, therefore, recommended preventive programmes geared towards identifying the risk factors for suicidal behaviours and drug abuse.

The extent of the link between alcohol use and suicidal behaviour at the individual and population level was revised by [Norström and Rossow \(2016\)](#). In total, 14 reviews of individual-level studies and 16 primary population-level studies were found in systematic literature searches. Suicidal behaviour frequently involves alcohol misuse and intoxication; alcohol addicts have a higher risk of suicide, and rising rates of population drinking are

frequently linked to rising suicide rates. The estimated size of the relationship varies between men and women, as well as among cultures with diverse drinking habits.

Based on the aforementioned extant literature, the present study postulated that drug abuse will have a positive association with suicidal thoughts.

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Methodology

Study design, population and sample

With the use of a cross-sectional design, the present study made use of a selected sample at a single point in time. The design was chosen because it enabled the researchers to establish the relationship between the study variables while saving time (Rindfleisch *et al.*, 2008; Suleman *et al.*, 2022b). The population for the study consisted of workers from three main industries (banking, telecommunication and manufacturing) in the Ghanaian economy. The three sectors were conveniently selected as they encompassed the organisations that expressed willingness to participate in the study. The estimated population for the volunteered organisations in the three industries are banking (250), telecommunication (320) and manufacturing (350), respectively. The purposive sampling technique was used to select participants who indulge in the use of drugs of any kind. In all, 495 questionnaires were distributed to respondents (volunteers) from the three sectors of the economy. However, 482 questionnaires were completed and returned; out of which, 470 were deemed fit for purpose as 12 of the questionnaires were not fully completed. Details of the sample selected from the various sectors for the study are presented in Table 1.

Measurement instrument

Data were collected with the use of standardised instruments to assess the variables under investigation. The questionnaires were divided into three sections (sections A, B and C). The first section collected data on the demographic characteristics of the respondents. The second section of the questionnaire (section B) assessed employee suicidal thoughts using the positive and negative suicide ideation inventory (Osman *et al.*, 1998). The suicidal thoughts scale was a Likert-type scale with scores from 1 to 5 where a higher score indicates more suicidal thoughts and a lower score indicates less suicidal thoughts. Reverse items on this instrument (items 2, 6, 8, 11, 12, 13 and 14) were duly handled. Examples of items on the scale include “felt that you were in control of most situations in your life” and “thought about killing yourself because you could not accomplish something important in your life.” The scale reports a high-reliability coefficient ($\alpha > 0.70$).

Section C assessed drug abuse. This was assessed using the Drug Abuse Screening Test (DAST-10) developed by the Addiction Research Foundation with a Cronbach’s alpha = 0.85. The Drug DAST was developed in 1982 and is still an excellent screening tool. It is a 10-item self-report scale that consists of items that parallel those of the Michigan Alcoholism Screening Test (MAST). The DAST has “exhibited valid psychometric properties” and has been found to be “a sensitive screening instrument for the abuse of drugs other than alcohol (Adekeye *et al.*, 2017). A score of “1” is given for each YES response. Sample items on the instrument include “Have you used drugs other than those required for medical reasons? Have you abused prescription drugs? Do you abuse more than one drug at a time?”.

	Frequency	Percentage
Banking	156	33.2
Manufacturing	157	33.4
Telecommunications	157	33.4

Table 1.
A summary of the
respondents selected
from the sectors

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Data collection procedure

Prior to the actual data collection, ethical approvals from the various organisations were sought by the researchers. Subsequently, respondents from the various organisations were briefed on the purpose of the study, assured of confidentiality and anonymity, who then consented (signed consent forms) to participate in the study and were later given questionnaires by the researchers to respond to at their convenience. Secured collection boxes were placed at vantage points within the various organisations into which respondents posted their responses after completing the questionnaires and securing them in sealed envelopes. Data collection lasted for five weeks after which 482 questionnaires were returned out of the 495 questionnaires distributed. However, 470 questionnaires were deemed valid for use. Collected data were analysed with both descriptive and inferential statistics.

Results and findings

The main statistical tests employed for data analysis were the multivariate analysis (MANOVA), Pearson’s r test and hierarchical regression. The MANOVA was used to test differences in drug abuse and suicidal thoughts by sector of an organisation. The Pearson’s r test was used to establish the relationship between suicidal thoughts and drug abuse among employees in the three sectors used for the study. As indicated in Table 2, there was no significant difference in drug abuse by sector [$F = 0.17, P > 0.05$]. However, there was a significant difference in suicidal thoughts by sector [$F = 2.96, p < 0.05$]. The significant difference in suicidal thoughts by sector warrants the use of post-hoc analysis.

From the multiple comparison results in Table 3, it was revealed that employees in the banking sector reported a higher level of suicidal thoughts than those in the telecommunication sector [$mean\ difference = 1.84, p < 0.05$] and manufacturing sector [$mean\ difference = 1.56, p < 0.05$].

As shown in Table 4 above, there was a significant positive relationship between suicidal thoughts and drug abuse [$r = 0.30, p < 0.01$]. A further regression analysis was conducted to establish the precise relationship between drug abuse and suicidal thoughts.

As shown in Table 5, drug abuse contributed 9% of the changes in employee suicidal thoughts [$R^2 = 0.09, p < 0.01$], after controlling for demographic variables (gender and sector). The relationship between drug abuse and suicidal thoughts is reported to be significant [$\beta = 0.30, p < 0.01$].

Table 2.

A summary of the multivariate analysis showing differences in drug abuse and suicidal thoughts by sector

	Sector	N	Mean	SD	F	p
Drug abuse	Banking	156	2.89	10.91	0.17	0.92
	Telecommunication	157	2.77	12.59		
	Manufacturing	157	3.36	14.12		
Suicidal thoughts	Banking	156	4.34	9.16	2.96	0.03
	Telecommunication	157	2.49	1.36		
	Manufacturing	157	2.78	1.62		

Table 3.

A summary of the multiple comparison analysis showing the difference in suicidal thoughts by sector

	1	2	3
1. Banking	–		
2. Telecommunication	–1.84*	–	
3. Manufacturing	–1.56*	0.28	–

Discussion of results

The present study set out to examine the relationship between drug abuse and suicidal thoughts among Ghanaian workers. Findings from the study indicated that drug abuse related positively to suicidal thoughts. The work environment, accompanied by COVID-19 challenges, is physically and emotionally draining and, therefore, heavily affects the well-being of employees (Stogner *et al.*, 2020). In order to manage the challenging nature of the work environment characterised by uncertainty, role overload/underload, role conflict, role ambiguity among others (Suleman *et al.*, 2022a), employees may resort to varying means of coping including drug abuse. As earlier pointed out in the study, drug abuse is a risk factor for suicidal thoughts and hence a relationship between drug abuse and suicidal thoughts (Breet *et al.*, 2018; Pompili *et al.*, 2012). Among today's employees, the nature of work has changed drastically and become more challenging due to changes brought about as a result of COVID-19; some workers have to be working from home via the Internet, unstable Internet, pressure to meet deadlines and fear of losing their jobs, all of which pose immense stress to employee well-being (Stogner *et al.*, 2020). The challenging and stressful nature of employee work duties emanating from turbulence caused by COVID-19 renders employees physically and psychologically unstable (Kaushal and Srivastava, 2021). This employee instability makes them resort to means of coping including drug abuse. Over time, the consumption and abuse of drugs may render employees to be riskier of having suicidal thoughts. It is also worth mentioning that deep rooted to the association between drug abuse and suicidal thoughts may be psychopathological or neuropsychological tendencies (Alcaro *et al.*, 2021; Cabib *et al.*, 2020) and other mediating factors (not considered in this study). This finding falls in tandem with the shattered assumptions theory suggesting that when an individual encounters an event that damages their worldview, the individual no longer perceives the world as benevolent and predictable or themselves as competent and invulnerable. This maladaptive thinking about the world and themselves propel them to engage in maladaptive behaviours such as abusing drugs (a risk factor to suicidal thoughts).

Further, the recent banking crisis witnessed in Ghana has led to most banking employees being laid off (Kyei-Frimpong *et al.*, 2022; Osman, 2019). The instability and job insecurity in the banking sector contributes to job stress and emotional turmoil which may further lead to employees to engage in coping mechanisms and maladaptive behaviours including drug abuse (Giorgi *et al.*, 2017; Osman, 2019). Accompanied by some underlining psychopathological tendencies, employees in this sector contemplate of suicide compared to employees in other sectors where there is stability and relatively a high level of job security.

Table 4.
A summary of the Pearson r test showing the relationship between suicidal thoughts and drug abuse

	N	Mean	SD	R	p
Suicidal thoughts	470	3.18	5.36	0.30	0.00
Drug abuse	470	2.75	11.7		

Table 5.
A summary of the regression showing the relationship between drug abuse and suicidal thoughts

	Beta	T	p	R ² change
Step 1				0.00
Gender	-0.01	-0.31	0.76	
Sector	-0.01	-0.27	0.79	
Step 2				0.09**
Drug abuse	0.30	6.80	0.00	

Note(s): NB: **p < 0.01

Limitations of the study

Like many other studies, the present study made use of self-report measures and correlational data to show the relationship between drug abuse and suicidal thoughts. Even though self-report measures are good, they have been critiqued for some flaws such as being subjective. Similarly, correlational data are appropriate for demonstrating associations but not cause and effect relationships. In line, findings from the study should be interpreted with caution in light of the above limitations. Therefore, future studies could analyse more deeply (e.g. longitudinal) the nature of the relationship between drug abuse and suicide, recognising that it is far more complex than a traumatic response to “assumption shattering” by exploring the mediation roles of psychopathological conditions such as stress.

Implications and recommendations

As evident in the present study, drug abuse is identified as a risk factor for suicidal thoughts among employees. Managers of organisations need to redesign work in order to embrace the challenging circumstances brought about as a result of COVID-19. The work environment needs to be more supportive in order to shield employees from the physical and emotional demands of work during and after this period of the COVID-19 pandemic.

Today than ever, the importance of employee-assisted programmes (EAPs), employee well-being programmes (EWPs) and mindfulness-based stress reduction (MBSR) protocol have been more than justified. Managers of organisations are being called upon to invest in EAPs/EWPs/MBSRs geared toward equipping employees with the needed skills to cope with stressful conditions and not indulge in drugs. Smoking cessation programs, drug management therapies and intensive mindfulness training are supposed to be an integral part of well-being programmes aimed at establishing equilibrium and gradually creating a wide gap between employees and suicidal thoughts.

Similarly, the management of organisations are encouraged to enhance their health and safety units by including occupational health psychologists and mental health practitioners who will serve as counsellors for employees going through challenges at work and also help identify early warning signals, which go unnoticed leading to drug abuse and its resultant suicidal thoughts. Establishing counselling units with qualified psychologists is more eminent in today’s work environment if organisations would want to keep their most valued assets intact.

The development of psychosocial risk management (PRIMA) has become apparent not only at the enterprise level but also at the national level as nations cannot continue to lose the productive workforce through work-related stress and its attendant drug abuse and resultant suicidal thoughts. Evident in the work environment today are stressors emanating from employees and their interaction with the work environment and the management of work. Most health and safety policies have tended to focus on physical safety issues neglecting the social and mental well-being issues of employees, which are the major causes of workplace and incidents. Triggers in the social and mental well-being of individuals largely account for the use of drugs among many. Thus, a policy that addresses psychosocial risk factors in the work environment is not only desirable but very appropriate in promoting the physical, mental and social well-being of all employees in all occupations.

Conclusion

The consequential effect of COVID-19 has been tremendous causing work to be more demanding for employees and requiring adaptative skills. In order to manage the demanding nature of work duties, employees may resort to varying means of coping including drug abuse. The abuse of drug as a means of handling work demands and work-related stress predispose employees to

suicidal thoughts. It is crucial from this study that work needs to be redesigned and perfect fit is found for employees in line with changes brought about by COVID-19. Besides, organisations need to support employees in adapting to changes and demands at work. All these will in turn shield employees against resorting to negative means of coping such as drug abuse which predisposes them to suicidal thoughts.

Creating a resilient economy requires a resilient and productive workforce. Today's environment is turbulent and chaotic requiring the adaptive behaviours of employees for survival. Today than ever, governments and captains of industries are admonished to create conditions that will limit negative adaptive behaviours such as the use of drugs, which have been found to lead to suicidal thoughts and are very destructive. This study has created a fertile ground for more empirical studies to be conducted among employees and the African context on the role of drug abuse in predicting suicidality.

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Corresponding author

Abdul-Razak Suleman can be contacted at: abdulrazaksuleman10@gmail.com

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