# Personality Determinants of Burnout Among Nurses: A Study at Nakuru County Referral Hospital

Charles AYWAK<sup>1</sup>, Abigael ROTICH<sup>2</sup>

<sup>1</sup>Kabarak University, 13 P.O. Box Private Bag, Kabarak, 20157, Kenya Tel: +254 0722 555 999, Email: authoremail@domain.com Tel: +254 717 400 562, +254 700 426 609, Email: rotichabigael9703@gmail.com, caywak@kabarak.ac.ke

Abstract: Workplace burnout is characterized as feelings of energy depletion or exhaustion; increased mental distance from one's job, or feelings of negativism or cynicism related to one's job; and reduced professional efficacy. The purpose of this study was to establish the relationship between personality traits and burnout among nurses at Nakuru County Hospital. A cross sectional study design was adopted. The majority of the respondents were fully employed (84%), aged 21-50+, gender 80.3% female, 47.4% single, 44.7% married. Most respondents (68.4%) attained ≤ Diploma while 31.5% had ≥ BSc.N with work experience of 1-≥15. Findings: Most of the nurses had traits of conscientiousness (44.7%) and agreeableness (34.2%). Overall, 44.2% of nurses had moderate-high emotional burnout, 77.6% depersonalization of moderate-high and 21% moderate-high decreased personal competence. Conscientiousness scored significantly high on emotional exhaustion (moderate-tohigh 36.6%) and depersonalization (moderate-to-high 34.1%). The agreeableness trait scored high on depersonalization ((moderate-to-high 36.6%). There is significant prevalence of burnout among nurses with conscientiousness and agreeableness personality traits. In-depth qualitative assessment of burnout experience among different personality traits among nurses is recommended.

**Keywords:** Burnout, emotional exhaustion, Decreased Personal Competence, conscientiousness, agreeableness.

## 1. Introduction

The concept of burnout was first recognized in the caregiving professions in the mid-1970s. The term describes the process of gradual exhaustion and loss of commitment observed in those working in these settings. Defined as a psychological syndrome that develops in response to chronic work stress, it is comprised of three symptoms; reduced professional efficacy where the individual no longer feels like they are competent and successful at work, development of a cynical and impersonal response toward recipients of care, and exhaustion, and heightened feelings of being emotionally overextended and exhausted by work. (Maslach, C., and Leiter, M.P., 2016)

For many years, burnout has been recognized as an occupational hazard for various peopleoriented professions, such as such as nursing. The therapeutic or service relationships that such providers develop with recipients require an on-going and intense level of personal, emotional contact. Although such relationships can be rewarding and engaging, they can also be quite stressful. (Maslach & Leiter, 2016)

Personality refers to individual differences in characteristic patterns of thinking, feeling and behaving. The study of personality focuses on two broad areas: understanding individual differences in particular personality characteristics, such as sociability or irritability on one



hand, and on the other is the understanding of how the various parts of a person come together as a whole. (Kazdin, A. E., 2000)

Nursing is viewed as a high stress job because of the physical labour, human suffering, long work hours, staffing and interpersonal relationships. According to recent findings by Zimmerman (2017), 70% of nurses reported burnout in their current position but were largely satisfied with their job overall despite the high levels of emotional stress.

# Statement of the problem

In a survey among nurses, 98% of hospital nurses reported their work as being mentally and physically demanding with 85% of them stating that their jobs make them fatigued. Further, 63% of the nurses stated that their work resulted in burnout, 44% expressing concern that the burnout would cause suffering to their patients and 41% of the surveyed group has considered changing hospitals within the year. According to Keyrel (2017), burnout among nurses is shrinking the workforce, with almost half of the nurses considering leaving the profession.

Burnout can manifest itself in different ways. In nurses, it has been associated with a reduced sense of personal well-being strained relationships with others, including patients, and the need for time off work. Burnout can hamper the nurses' effectiveness at work, with reduced energy and impaired decision-making. The development of burnout explains, at least in part, accounts for the high dropout rate for newly qualified nurses. (Madigan, D. & Hill, A., 2020)

Nurses practice coping strategies to deal with burnout that include focusing on the job, use of social support groups, withdrawal to self, diversion, and denial (Theodoratou *et al.*, 2006). However, professional measures taken to prevent and manage burnout including listening to complaints and worries of the nurses, making a happy and healthy workplace environment, ensuring that equipment are fully functional and well maintained, giving nurses reasonable conditions, fair compensation and allowing nurses to have a voice.

Maslach *et al.* (2001) suggested that there are national differences in the way burnout presents among specific groups of individuals with attribution to cultural values and economic condition of different countries. Thus, the way in which people experience and perceive burnout in less developed countries like Kenya may be in contrast with the way it is perceived and experienced in developed countries. It is therefore necessary to study this phenomenon of burnout in this country. While many studies have been conducted about burnout in Kenya, none focused specifically on the impact of personality type on the development of burnout. This study therefore set to investigate how different personality types predispose individual nurses to the development of burnout syndrome.

## **Objectives**

The specific objectives of the study were to:

- Determine the personality types of nurses in Nakuru County Referral hospital.
- Assess the level of burnout among nurses in Nakuru County Referral hospital.
- Explore the relationship between personality traits and the levels of burnout among nurses in Nakuru County Referral hospital.



# **Literature Review**

Individual differences in characteristic patterns of thinking, feeling and behaving constitute the definition of personality. (Kazdin, A. E., 2000). The Big Five personality traits model is one of the most established and recognized approaches to describe and measure individual differences in personality, and includes openness to experience, conscientiousness, extraversion, agreeableness and neuroticism (Power, R. & Pluess, M., 2015). Although openness captures imagination and intellectual curiosity, conscientiousness refers to tendency to be responsible, organized, hard-working, goal-directed, and to adhere to norms and rules. Extraversion is defined by positive emotions, such as gregariousness and the tendency to seek out stimulation. Neuroticism includes negative emotions, such as anxiety and depression, and is commonly defined as emotional instability, and agreeableness describes an individual's level of cooperativeness and compassion. (Power & Pluess, 2015). Openness involves six specific and unique aspects of a broader personality traits, or dimensions, including active imagination (fantasy), aesthetic sensitivity, attentiveness to inner feelings, preference for variety, and intellectual curiosity. Goldberg L. R. (1993) The Big Five personality model thus offers a simple blueprint to describe and measure individual differences in personality. Further, twin studies indicate that the Big Five personality traits have substantial heritable components explaining 40–60% of the variance (Power & Pluess, 2015). Thus, in any workplace situation such as a hospital, there is a high likelihood that all these personality traits represented.

The experience of burnout in human service occupations, and particularly health care has received attention of much research especially in the last few decades. The definition of burnout as a psychological syndrome emerging as a prolonged response to chronic interpersonal stressors on the job, consisting of three key dimensions of an overwhelming exhaustion, feelings of cynicism and detachment from the job, and a sense of ineffectiveness and lack of accomplishment (Maslach & Leiter, 2016), is now well established in literature.

That burnout is particularly prevalent among nurses is unsurprising given the many stressors they experience every day, even before you factor in the demands special units such as intensive care and emergency units. Burnout can manifest itself in different ways among nurses, where it has been associated with a reduced sense of personal well-being, strained relationships with others, including patients, and the need for time off work. (Hoff, T., Shannon Carabetta, S. and Collinson, G. E., 2019).

Burnout can hamper your effectiveness at work, with reduced energy and impaired decision-making. The development of burnout explains, at least in part, the high dropout rate for newly qualified nurses. (Madigan, D. & Hill, A., 2020)

# Methodology

## **Study setting**

The study setting was the Nakuru County Level-5 referral hospital. Nakuru County is the fourth largest county in Kenya with a population of over 1.6 million. It is a multicultural county with a majority of males about 50.2% and females 49.8%. The main economic activities include trade business, tourism, livestock rearing and farming. The capital and



largest town is Nakuru. Nakuru County Referral hospital previously known as Provincial General Hospital is located in Nakuru Town with a capacity of 588 beds.

## RESEARCH DESIGN

The study adopted a descriptive cross-sectional research design.

#### STUDY POPULATION

The target population comprised of all nurses in Nakuru Level-5 Hospital. The inclusion criteria were enrolled or registered nurses who must have been in employment in the nursing profession for  $\geq 1$  year, and have consented to participate by the time of the study. Those who had worked for less than 1 year and, the nurses who declined to participate were excluded.

## Sampling and sampling procedure

Convenience sampling of the nurses the nurses who were accessible in the hospital wards at the time of the study was used. A list of all nurses who were present during the time of the study was used as a sampling frame. Simple random sampling using was applied to select the nurses who met the inclusion criteria. The random numbers generator for sequenced integers was used to generate randomized sequences of integers (like raffle tickets drawn from a hat), where each number can only occur once (<a href="https://www.random.org/integers/">https://www.random.org/integers/</a>).

# Sample size determination

The sample size of 76 nurses was determined using Naissuma's formula for finite population, derived from Godden, W. (2004.

## **Data collection**

Data was collected using a researcher formulated and pre-tested questionnaire that contained components of *The Big Five Personality scale* comprising 44 items of measurement that describe each of 5 personality traits, namely: Extroversion (E), the personality trait of seeking fulfilment from sources outside the self or in community. High scorers tend to be very social while low scorers prefer to work on their projects alone. Agreeableness (A) reflects individuals who tend to adjust their behaviour to suit others. High scorers are typically polite and like people. Low scorers tend to 'tell it like it is'. Conscientiousness (C) is the personality trait of being honest and hardworking. High scorers tend to follow rules and prefer clean homes. Low scorers may be messy and cheat others. Neuroticism (N) is the personality trait of being emotional, with a higher likelihood than average to be moody and to experience such feelings as anxiety, while the trait of Openness to Experience (O) is the personality trait of seeking new experience and intellectual pursuits. High scores may day dream a lot. Low scorers may be very down to earth.

The validity and reliability of the Big Five personality traits scale has been tested on nurses where respondents were required to rate their degree of agreement in the questionnaires with regard to their personality traits. Initial pilot test results showed an excellent internal reliability for each of the subscales. However, validity test extracted only four factors of the Big Five Inventory with factor loadings ranging from 0.573 to 0.803. The four factors were



extraversion, conscientiousness, neuroticism and openness to experience. The reliability coefficients for all the extracted factors were above 0.7. Thus, the validated measures of the Big Five Inventory were deemed consistent and reliable throughout the study. (Hee, O.C., 2014)

The Maslach burnout inventory comprises of section A, B and C. Section A: Identifies existence of burnout manifestation as physical symptoms using 7 questions. A score of 17 and below indicates low level of burnout, 18 to 29 indicates moderate level burnout and a score above 30 indicates high level of burnout.

Section B: Examined negative feelings towards the job, colleagues and overall depersonalizing attitudes and loss of empathy towards others. A score of 5 and below indicates low level burnout. A score of 6 to 11 indicates moderate level burnout and over 12 indicates high level burnout.

Section C: Examined failure to perform, absenteeism and emotional distress manifesting as self-insufficient feelings. A score of 33 or less indicate high level burnout. A score of 34 to 39 indicates moderate burnout and 40 indicates low level burnout.

The scores on the three factors of the Maslach Burnout Inventory-General Survey (MBI-GS) tested in South Africa were found to be normally distributed, with the Cronbach alpha coefficients ≥7.00 (the scales are considered to be acceptable when compared with the guideline of a>0.70, Nunnally & Bernstein, (1994). The three-factor structure of the burnout construct was largely confirmed and its sub-scales were internally consistent. Based on the results obtained in this study, it seems as if the MBI-GS is a suitable instrument for measuring burnout among police members in the SAPS.

## **Results**

**Table 1: Table Showi**ng Socio-Demographic Characteristics of Respondents

CHARACTERISTIC		FREQ.	%		
Employment					
	Full-time	64	84.2		
	Part-time	12	15.8		
Age of respo	ondents				
	21-29	39	51.3		
	31-39	8	10.5		
	41-49	16	21.1		
	≥ 50	13	17.1		
Gender of respondents					
	Male	15	19.7		
	Female	61	80.3		
Marital status					
	Single	36	47.4		
	Married	34	44.7		
	Divorced/separated	2	2.6		
	Widowed	4	5.3		
Highest qua	Highest qualification				
	Enrolled nurse	6	7.9		



Registered nurse (Diploma)	46	60.5	
Registered nurse (BSc.N)	22	28.9	
Masters and above	2	2.6	
Years of experience			
1-5	31	40.8	
6-10	9	11.8	
11-14	4	5.3	
≥15	32	42.1	

**Table 2: A Table Showing** Personality Traits of Respondents (n=76)

	7 0 0 0	<del>-)</del>
CHARACTERISTIC	FREQ.	%
Extroversion	2	2.6
Agreeableness	26	34.2
Conscientiousness	34	44.7
Openness to experience	7	9.2
Neuroticism	7	9.2

Table 3: Table Showing Levels of Burnout among Respondents

Table 5. Table Showing Levels of Burn	out among responden	ıs	
LEVEL OF BURNOUT	FREQ.	%	
Emotional Exhaustion			
Low	42	55.3	
Moderate	26	34.2	
High	8	10.5	
Depersonalization			
Low	17	22.4	
Moderate	28	36.8	
High	31	40.8	
Decreased Personal Competence			
Low	60	78.9	
Moderate	7	9.2	
High	9	11.8	

Table 4: Table Showing the Relationship between Socio-Demographic Characteristics of Respondent and Emotional Exhaustion (n=76)

**CHARACTERISTIC EMOTIONAL EXHAUSTION** Moderate High Low Employment 42 (55.3%) Full-time 22 (28.9%) 0 (0%) Part-time 0 (0%) 4 (5.2%) 8 (10.5%) Age of respondents 21-29 39 (51.3%) 0 (0%) 0 (0%) 31-39 3 (3.9%) 5 (6.5%) 0 (0%) 41-49 0 (0%) 0 (0%) 16 (21%) ≥ 50 0 (0%) 5 (6.5%) 8 (10.5%) Gender of respondents Male 15 (19.7%) Female 27 (35.5%) 26 (34.2%) 8 (10.5%)



Marital status						
Single	36 (47.3%)	0 (0%)	0 (0%)			
Married	6 (7.8%)	0 (0%)	2 (2.6%)			
Divorced/separated	0 (0%)	26 (34.2%)	2 (2.6%)			
Widowed	0 (0%)	0 (0%)	4 (5.2%)			
Highest qualification	Highest qualification					
Enrolled nurse	6 (7.8%)	0 (0%)	0 (0%)			
Registered nurse (Diploma)	36 (47.3%)	10 (13.1%)	0 (0%)			
Registered nurse (BSc.N)	0 (0%)	16 (21%)	6 (7.8%)			
Masters and above	0 (0%)	0 (0%)	2 (2.6%)			
Years of experience						
1-5	31 (40.7%)	0 (0%)	0 (0%)			
6-10	9 (11.8%)	0 (0%)	0 (0%)			
11-14	2 (2.6%)	2 (2.6%)	0 (0%)			
≥15	0 (0%)	4 (5.2%)	8 (10.5%)			

According to the results, a majority of the nurses who were full time employees had low

**Table 5: Table Showing the Relationship between Personality traits of Respondent and Levels of** Burnout levels (n=76)

BURNOUT	PERSONALITY TRAITS				
LEVELS	Extroversion	Agreeableness	Conscientiousness	Neuroticism	Openness to
					Experience
Emotional					
Exhaustion					
Low	2 (2.6%)	25 (32.8%)	15 (19.7%)	0 (0%)	0 (0%)
Moderate	0 (0%)	0 (0%)	18 (23.6%)	6 (7.8%)	2 (2.6%)
High	0 (0%)	1 (1.3%)	1 (1.3%)	1 (1.3%)	5 (6.5%)
Depersonalization					
Low	2 (2.6%)	15 (19.7%)	0 (0%)	0 (0%)	0 (0%)
Moderate	0 (0%)	18 (23.6%)	10 (13.1%)	0 (0%)	0 (0%)
High	0 (0%)	1 (1.3%)	16 (21%)	7 (9.2%)	7 (9.2%)
Decreased					
Personal					
Competence					
Low	2 (2.6%)	25 (32.8%)	33 (43.4%)	0 (0%)	0 (0%)
Moderate	0 (0%)	0 (0%)	0 (0%)	6 (7.8%)	1 (1.3%)
High	0 (0%)	1 (1.3%)	1 (1.3%)	1 (1.3%)	6 (7.8%)

## **Conclusion and Recommendations**

In conclusion, the study showed a significant prevalence of burnout among nurses with conscientiousness and agreeableness personality traits. Overall, most of the nurses scored, low (55.3%), moderate (34.2 %) and high on emotional exhaustion, respectively. A significant number of the nurses with conscientiousness personality trait experienced moderate emotional exhaustion, while those with the agreeableness trait scored moderate on depersonalization. The nursing managers on the other hand, appeared to use stigmatizing characterization those with burnout by describing them as "lazy, self-centeredness and poor team workers", as well as opining that those "who are reserved and quiet are more prone to



develop burnout". The study recommends in-depth studies using qualitative approaches to the assessment of the experience of burnout among different personality traits among nurses, as well as the understanding of burnout and its intervention among the nurse managers. Further, a study to establish whether the personality traits of conscientiousness and agreeableness are nurtured in training or whether those with such traits tend to choose nursing as a career?

## References

- American Psychiatric Association. (2013). Diagnostic and statistical manual of mental disorders (5th ed.).
- Asendorpf JB, Wilpers S. Personality effects on social relationships. J Pers Soc Psychol 1998; 74: 1531.
- Maslach, C., and Leiter, M.P. (2016). "Understanding the burnout experience: recent research and its implications for psychiatry", World Psychiatry 15:2, pp 103-111. https:// DOI:10.1002/wps.20311
- Costa P.T., McCrae R.R. (1992). Revised NEO Personality Factor Inventory (NEO PI-R) and NEO Five Factor Inventory. Psychological Assessment Resources: Odessa, FL, Check List for styles.
- Godden, W. (2004). *Sample Size Formulas*. Retrieved from <a href="http://williamgodden.com/samplesizeformula.pdf">http://williamgodden.com/samplesizeformula.pdf</a>
- Schaufeli, W.B., Leiter, M.P., and Maslach, C. (2009), "Burnout: 35 years of research and practice", *Career Development International*, Vol. 14 No. 3, pp. 204-220. <a href="https://doi.org/10.1108/13620430910966406">https://doi.org/10.1108/13620430910966406</a>
- Kazdin, A. E. (2000). Encyclopedia of psychology. Washington, D.C: American Psychological Association.
- Grant, S., & Langan-Fox, J. (2007). Personality and the occupational stressor-strain relationship: The role of the Big Five. *Journal of Occupational Health Psychology*, *12*(1), 20–33. <a href="https://doi.org/10.1037/1076-8998.12.1.20">https://doi.org/10.1037/1076-8998.12.1.20</a>
- Goldberg L. R. (1993). "The structure of phenotypic personality traits". *American Psychologist.* **48** (1): 26–34. <u>doi:10.1037/0003-066X.48.1.26</u>. <u>PMID</u> <u>8427480</u>.
- Hee, O. C. (2014). Validity and Reliability of the Big Five Personality Traits Scale in Malaysia. Innovative Space of Scientific Research Journals. 5 (4): 309-315. http://www.ijias.issr-journals.org/
- Nunnally, J.C. & Bernstein, I.H. (1994). Psychometric Theory (3 rd Edition). McGrawHill Series in Psychology, McGraw-Hill, Inc., New York: NY, 264-265.
- Power, R., Pluess, M. Heritability estimates of the Big Five personality traits based on common genetic variants. *Transl Psychiatry* **5,** e604 (2015). <a href="https://doi.org/10.1038/tp.2015.96">https://doi.org/10.1038/tp.2015.96</a>



Watson D, Humrichouse J. Personality development in emerging adulthood: integrating evidence from self-ratings and spouse ratings. J Pers Soc Psychol 2006; 91: 959