**Burnout Among Hospital Administrators Working in Ministry of Health (MOH) Malaysia Hospitals**

**1.0 Introduction**

* 1. **Background**

The healthcare sector is continuously evolving, leading to increasingly demanding and stressful working conditions in facilities like hospitals. In line with the World Health Organization's (WHO) definition, a healthy workplace is one where workers and managers collaborate to continually enhance the health, safety, and well-being of all employees, fostering a sustainable work environment.

Burnout, a work-related syndrome primarily affecting professions involving extensive human interaction, was first clinically identified by Herbert Freudenberger in the early 1970s. Notably, it is not classified as a medical condition by the International Classification of Disease (ICD-11). Burnout often arises from inadequately managed long-term workplace stress and primarily pertains to the occupational context, distinct from other life domains (WHO, 2019). Its origins are multifactorial, influenced by individual, occupational, personality, and coping factors (De Hert & Burnout, 2020). Researchers often explore three dimensions of burnout: energy depletion or exhaustion, increased mental detachment from one's job, and reduced professional efficacy (WHO, 2019).

This study seeks to ascertain the prevalence of burnout syndrome among hospital administrators in MOH Malaysia Hospitals and to uncover the coping strategies they employ. It also aims to determine whether these findings correlate with relevant sociodemographic and professional characteristics. The insights gained from this research will serve as a crucial guide for planning and implementing preventive measures against burnout and promoting healthy coping strategies. Ultimately, these initiatives aspire to enhance working conditions and the overall quality of work and life for healthcare workers in Malaysian hospitals.

**1.2 Literature Review**

Burnout is a prevalent issue across various professions, including hospital administrators, impacting individuals at various stages of their medical careers, such as medical students, house officers, medical officers, and specialists (Tajirian et al., 2020). Notably, a national report highlights that approximately 26.5% of junior doctors in Malaysia face burnout, with a higher prevalence among those with less than six months of experience and those assigned to emergency postings (Zuraida, Zainal, & Zainal, 2015). Moreover, the statistics indicate that doctors, in particular, are more susceptible to burnout (51%) compared to other healthcare professionals like nurses, assistant medical officers, and hospital attendants (Siau et al., 2018).

Further analysis reveals that among doctors in Malaysia, those working in the pediatric department exhibit a higher likelihood of experiencing burnout when compared to their counterparts in departments such as accident and emergency, medical, orthopedics, psychiatry, obstetrics and gynecology, and surgery (Siau et al., 2018).

* 1. **Study Objectives** 
     1. **General Objective**

The primary aim of this study is to assess the occurrence of burnout syndrome among hospital administrators in MOH Malaysia and explore the factors linked to it

**1.2.2 Specific Objectives**

The study's specific goals are as follows:

i. To investigate the sociodemographic and professional variables linked to burnout among hospital administrators in MOH Malaysia.

ii. To uncover the factors connected to burnout among hospital administrators in MOH Malaysia.

iii. To identify the determinants of burnout among hospital administrators in MOH Malaysia.

**2.0 Methodology**

**2.1 Study Design**

The study will adopt a quantitative cross-sectional approach and will take place between January 2024 and February 2024, involving the participation of all 149 hospital administrators within MOH hospitals.

**2.2 Study Population**

The study will focus on the target population, which comprises individuals holding positions as hospital administrators within MOH hospitals. Hospital administrators, in this context, are individuals responsible for overseeing the day-to-day operations of a hospital, ensuring the delivery of high-quality patient care. They utilize their administrative skills to strategize and coordinate medical services and treatment options, taking into account hospital budgets, available funding, and available resources. Furthermore, they play a pivotal role in setting objectives and evaluating the performance of healthcare providers and other medical staff.

a. Inclusion Criteria:

• Hospital administrators from all grades, categories, or departments, employed in any public MOH hospital.

• Healthcare workers (HCWs) from diverse backgrounds, including specialists, non-specialists, medical officers (MOs), assistant MOs, and nurses.

• Individuals who are presently employed at one of the 149 MOH hospitals.

b. Exclusion Criteria:

• Hospital administrators who are on extended leave or have been absent for more than one week, such as those on study leave, maternity leave, or undergoing training.

• Individuals not affiliated with MOH as staff or students.

• Hospital administrators currently diagnosed with mental illnesses and undergoing treatment.

**2.3 Sample Size Determination**

The determination of the sample size was based on three key factors:

i. The estimated prevalence of burnout among hospital administrators.

ii. A confidence level of 95%.

iii. A margin of error ranging from 0.01 to 0.05.

The necessary sample size was calculated using the following formula:

n = (z² x p(1-p)) / d²

Where:

n = required sample size

z = confidence level at 95% (standard value of 1.96)

p = estimated prevalence of burnout (27.3%) (Siau et al., 2018)

d = margin of error at 5% (standard value of 0.05)

Calculations:

n = (1.96² x 0.273 x (1-0.273)) / 0.05²

n = 305.2 ~ 305

To ensure an optimal sample size, adjustments were made as follows:

i. Adjustment for the design effect (deff) of 2.5 (based on NHMS, 2018):

n (complex) = n x deff

n (complex) = 305 x 2.5 (design effect) = 763

ii. Adjustment for the expected non-response rate of 20%:

n (adjusted) = n (complex) / (1 - non-response rate)

n (adjusted) = 763 / (1 − 0.2) = 953

Considering the specified requirements and adjustments, the total required sample size is:

**N = 953**

**2.4 Sampling Design**

In this study, a simple random sampling approach will be employed to guarantee that hospital administrators from MOH hospitals are chosen in a manner that accurately represents the entire nation.

**2.5 Study Tools**

Data collection will involve the use of a structured questionnaire, which will be administered online and made available in both English and Malay languages. The questionnaire comprises two sections: (A) Sociodemographic information and (B) The Maslach Burnout Inventory− Human Services Survey (MBI−HSS) for assessing burnout.

**2.5.1 Maslach Burnout Inventory-Human Services Survey (MBI-HSS)**

The MBI-HSS is a commonly employed tool for evaluating burnout syndrome within service-oriented professions, including hospital administrators. It is a well-established and validated instrument with widespread usage in both clinical and educational settings. This instrument delineates burnout into three key components: emotional exhaustion (EE), depersonalization (DP), and a diminished sense of personal accomplishment (PA). It comprises 22 items, which respondents’ rate on a six-point Likert scale, ranging from "0 - Never" to "6 - Every day." To compute total scores, participants' responses to these 22 questions are summed according to the three burnout domains. The specific cutoff scores for the three burnout domains are as follows:

|  |  |  |  |
| --- | --- | --- | --- |
|  | **Low** | **Moderate** | **High** |
| **Emotional Exhaustion** | 0 − 16 | 17 − 26 | > 27 |
| **Depersonalization** | 0 − 6 | 7 − 12 | > 13 |
| **Personal Accomplishment** | 0 - 31 | 32 − 38 | > 39 |

**Table 1: Scoring for MBI-HSS**

Nonetheless, for the purposes of this study, the practical interpretation of burnout aligns with the description that categorizes hospital administrators as experiencing burnout if they score significantly on either the emotional exhaustion (EE), depersonalization (DP), or both dimensions, as defined by Christina Maslach, Susan E. Jackson, and Michael P. (1996). It's worth noting that the Malay version of MBI-HSS has been verified as culturally fitting and suitable for use in Malaysia, boasting an overall Cronbach's alpha value of 0.94, as established by Chen et al. (2014).

**2.6 Study Procedure**

Data collection will take place within the individual hospitals, and participation is entirely voluntary. Stringent measures will be in place to ensure the utmost confidentiality, with no personal identifiers included in the questionnaire. Prior to completing the online questionnaire, participants will be asked to provide their consent.

**2.7 Ethical Approval and Consent Form**

Before commencing the study, ethical approval will be sought from the Medical Research and Ethics Committee (MREC) under the Ministry of Health Malaysia.

**2.8 Data Management**

**2.8.1 Data Processing**

Data entry will involve manual input into Microsoft Excel, followed by a thorough cross-checking and data-cleaning process.

**2.8.1 Data Analysis**

Statistical analyses will be carried out utilizing complex sampling analysis within the Statistical Package for Social Sciences for Windows version 26 (SPSS Inc., Chicago, IL, USA).

**3.0 Results**

**Reference**

Schaufeli, W. B. (2017). Burnout: A short socio−cultural history. In Burnout, fatigue, exhaustion (pp. 105−127). Palgrave Macmillan, Cham.

WHO. Burn-Out an ‘Occupational Phenomenon’: International Classification of Diseases; WHO: Geneva, Switzerland, 2019.

De Hert, S. Burnout in HealthcareWorkers: Prevalence, Impact and Preventative Strategies. Local Reg. Anesth. 2020, 13, 171–183.

Tajirian, T.; Stergiopoulos, V.; Strudwick, G.; Sequeira, L.; Sanches, M.; Kemp, J.; Ramamoorthi, K.; Zhang, T.; Jankowicz, D. The Influence of Electronic Health Record Use on Physician Burnout: Cross-Sectional Survey. J. Med. Internet Res. 2020, 22, e19274.

Zuraida, A.S.; Zainal, N.Z. Zainal, Exploring Burnout Among Malaysian Junior Doctors Using the Abbreviated Maslach Burnout Inventory. Malays. J. Psychiatry 2015, 24, 23–32.

Siau, C.S.;Wee, L.H.; Ibrahim, N.; Visvalingam, U.; Ling Yeap, L.L.; Yeoh, S.H.;Wahab, S. Predicting burnout and psychological distress risks of hospital healthcare workers. Malays. J. Public Health Med. 2018, 1, 125–136.

Christina Maslach; Susan E Jackson; Michael P. (1996). Maslach burnout inventory (third). Palo Alto, California Consulting Psychologist Press.

Chen, W.S., Haniff, J., Siau, C.S., Seet, W., Loh, S.F., Jamil, M.H.A., Sa'ar, N. and Baharum, N. (2014). Translation, cross−cultural adaptation and validation of the Malay version of the Maslach Burnout Inventory (MBI) in Malaysia. International Journal of Social Science Study, 2 (66).