Workplace Bullying among Nurses in Singapore: A Quantitative Survey

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ABSTRACT

The high prevalence rate of workplace bullying among nurses is alarming given the consequences for nurses and organizations. It is poorly understood in Asia due to limited studies. This study employed a quantitative, cross-sectional design using an electronic survey to examine the prevalence, antecedents, and consequences of workplace bullying among nurses in Singapore. Data collection took place between November 2021 and February 2022, with 152 nurses of different grades completing the electronic survey (response rate of 65%). Our survey showed that 42.8% of the nurses (n = 65) reported experiencing occasional workplace bullying or workplace incivility during the past six months, and 11.8% (n = 18) were identified as victims of workplace bullying during the past six months. Logistic regression identified three variables (working hours per week, personality, emotional stability, and work environment) that were significant predictors of workplace bullying. Workplace bullying significantly impacts nurses' job stress, job satisfaction, and turnover intention but does not affect their work productivity or absenteeism. The study demonstrates that workplace bullying will continue to persist and manifest differently in different countries. Workplace environment and hierarchy have a greater and more immediate impact on workplace bullying in Singapore than individual characteristics.

Keywords: Workplace Bullying; Incivility; Violence; Nurses; Healthcare; Survey; Quantitative; Cross-Sectional

INTRODUCTION

Workplace bullying is not new to nursing and is more prevalent in healthcare than in other sectors (Lever *et al*., 2019). Workplace bullying is the umbrella term for most types of workplace aggression and violence, from emotional abuse, physical violence, and the threat of violence (Houck *et al.*, 2017) This subject is extensively studied internationally, across disciplines, and especially in health care. Workplace bullying occurs when individuals perceive that they are the target of negative actions from one or more individuals over time.

A review by Bambi *et al.*, (2018) revealed that the prevalence rate for workplace bullying can range widely from 1.3% to 96%. Notwithstanding, existing evidence has demonstrated the widespread prevalence of workplace bullying in the nursing profession and across different countries (Trépanier *et al*., 2016; Spector, Zhou & Che, 2014).

Bullying is a complex and dynamic social phenomenon). There is empirical evidence showing that it has detrimental consequences, not only in terms of the health and well-being of nurses but also in terms of compromising the safety of patients. In a meta-analysis by Lu *et al.*, (2020), workplace bullying was found to cause job-related and well-being-related outcomes, such as mental and physical health problems, symptoms of post-traumatic stress, staff burnout, increased turnover, and decreased job satisfaction and organizational commitment.

Workplace bullying could result in a stressful work environment, which predisposes nurses and other healthcare professionals to a higher risk of stress, poorer work performance, patient safety issues, and organizational outcomes (Houck *et al.*, 2017). However, workplace bullying is poorly understood in Asia due to limited studies. According to Spector, Zhou, & Che, (2014), this phenomenon and manifestations of workplace bullying might differ across different

sociocultural and organizational settings, with Asian countries being more tolerant of such events than their Western counterparts. Based on the researchers' knowledge, only one study has examined workplace bullying among nurses in Singapore, however this study was conducted on new nurses which is limited by its qualitative design (Leong & Crossman, 2017). Therefore, it is against this background that this study is conducted to examine the prevalence, antecedents and consequences of workplace bullying among nurses in Singapore.

METHODOLOGY

Study Design

The researchers employed a quantitative, cross-sectional design using a survey to examine the prevalence rate of workplace bullying among nurses in a hospital in Singapore. The researchers also aim to explore whether any association exists between the nurses' demographics, personal characteristics, workplace environment and workplace bullying. Additionally, the researchers also aim to assess the impact of workplace bullying on nurses' job stress, job satisfaction, turnover intention, absenteeism, and work productivity over the past six months.

Setting and Participants

The study was conducted on nurses at a 190-bed private hospital in Singapore. Purposive sampling was used to recruit all 233 eligible participants. The inclusion criteria consisted of nurses of all job grades, including healthcare assistants who work for a minimum of six months at the institution. The exclusion criteria are nurses who have difficulty understanding English and completing the survey and locum staff who are not under the employment of the organization. Based on power analysis, a minimum sample of 146 participants would be required to achieve a 95% confidence level with a 5% margin of error. This study recruited a total of 152 participants.

Data Collection

Data collection occurred between November 2021 to February 2022. All eligible nurses were invited via email to complete an electronic survey during the study period. The survey was self-developed and comprises five sections: (i) demographics, (ii) personal characteristics (resilience, coping personality), (iii) work characteristics, (iv) workplace bullying, and (v) consequences of workplace bullying.

Demographic information included the following: gender, age, nationality, marital status, and pre-existing medical condition. Work characteristics included job grade, employment types, shift rotation, nursing experience, years of work at the current organization, and perceived work environment. The perceived work environment is measured using the TOP10 scale based on the Practice Environment Scale-Nursing Work Index questionnaire. The TOP-10 score ranges from 10 to 40, with higher scores indicating a more positive work environment (Gea-Caballero *et al.*, 2019). This scale was chosen to prevent respondent fatigue and increase the validity of the findings (Polit & Beck, 2019).

Personal characteristics such as resilience and personality were mentioned. Resilience was measured using the Brief Resilient Coping Scale (BRCS), a 4-item instrument designed to measure the ability to adapt to stressful situations (Sinclair & Wallston, 2004). The BRCS score ranges from 5 to 20, with higher scores indicating better coping perceptions. The BRCS is popular and has been widely used in many studies due to its ease of application (Kocalevent *et al.*, 2017). Personality was measured using the 10-item Personality Inventory (TIPI) (Gosling, Rentfrow, & Swann, 2003). The ten items measure the personality subtypes that one might display (extraversion, agreeableness, conscientiousness, emotional stability, openness to experiences, etc.).

Workplace bullying was measured using the 22-item Negative Acts Questionnaire-Revised (NAQ-R). It is a popular instrument that has been widely used for measuring the severity of workplace bullying. Scores would range from 22 to 110, where higher scores signify greater bullying severity (Serafin, Sak-Dankosky & Czarkowska-Pączek 2020).

Data for workplace bullying consequences included the following information: absenteeism, job productivity within the past six months, job stress, job satisfaction, and turnover intention. Both absenteeism and job productivity within the past six months were coded as categorical data. Job stress was measured using Parker and Decotiis' Job Stress Scale (JSS), a 13-item instrument measuring the level of agreement about one's perception of work stress (Parker & Decotiis, 1983). The JSS ranges from 13 to 65, with higher scores indicating higher stress. The turnover intention was assessed using a

validated 6-item Turnover Intention Scale (TIS-6), which is an abbreviated version of the widely validated original 15-item version (Bothma, & Roodt, 2013). The TIS-6 score ranges from 6 to 30, with higher scores indicating greater intent to turnover. Job satisfaction was measured using the Short Index of Job Satisfaction (SIJS), a simplified version of the original 18-item Index of Job Satisfaction. The 5-item SIJS demonstrates good construct validity and can be useful with other instruments to produce data with good psychometric properties (Sinval & Maroco, 2020). The SIJS ranges from 5 to 20, with higher scores indicating greater job satisfaction.

Data Analysis

The Data collected is analyzed using IBM SPSS Version 24.0. Descriptive statistics were used for univariate analysis of the participants' demographics, personal characteristics, and work characteristics, including the extent of workplace bullying In. Referential statistics were used to examine the association between the demographics, personal characteristics, workplace environment, and workplace bullying among nurses and determine if there were differences in the consequences between those who were perceived as "victims of bullying" and those who were not. The significance level was set at 0.05 for hypothesis testing.

Data Availability Statement

The dataset used and/or analyzed during the current study area is available from the corresponding author upon reasonable request.

Ethical Consideration

The study was approved by the PPA Business School Ethics Committee and adhered to principles and guidelines in accordance with the Declaration of Helsinki with approval no: SG/SH/1021 dated 22 October, 2021. Informed consent was obtained prior to data collection. All participants were informed that their participation was voluntary and that they could withdraw from the study at any time. Confidentiality and anonymity were also ensured.

RESULTS

A total of 152 nurses of different grades completed an electronic survey, achieving a response rate of 65%. Their demographic data and work characteristics are shown in Table 1. All of the participants were female. Almost half of them reported their marital status as "single" (n=74, 48.7%), while 45.4% were married. Over half of them held a Bachelor's degree (n=83, 54.6%), while 21.1% held diploma qualifications, 17.1% had a certificate or equivalent, and the rest held other qualifications. Majority of the staff were nurses from the Philippines, constituting 44.7% (n=68), followed by Singaporeans at 28.9% (n=44), Malaysians at 19.7% (n=30), with the rest coming from China, Myanmar, and India.

In terms of employment type, 98% of the participants are working full-time (n=149) and 75% worked rotating shift (n=114), while others work permanent night shift, (n=20, 13.2%), permanent morning/afternoon shift (n=10, 6.6%), and office hours (n=8, 5.3%). Most of them held positions as registered nurses or had higher job grades (82.2, n = 125). Most of them had over five years of clinical experience (n=133, 87.5%).

Table 1: Demographic and Work Characteristics of Participants (N = 152)

Characteristics	Not Bullied (cut-off value of 33)		Bullied (cut-off value of 33)		Statistical test	p-Value
Demographics						
	n	Mean	n	Mean		
Age	87	40.3	65	35.9		
					U = 2312.0	N.S.
	n	(% Within-group)	n	(% Within-group)		
Gender						
Male	0	(0)	0	(0)	N.A.	N.A.
Female	87	(100.0)	65	(100.0)		

Nationality						
Singapore	34	39.1%	10	15.4%	χ2 = 6.03	<0.05
Malaysia	17	19.5%	13	20.0%		
Philippines	29	33.3%	39	60.0%		
China	3	3.4%	2	3.1%		
India	4	4.6%	0	0.0%		
Myanmar	0	0.0%	1	1.5%		
Marital Status						
Single	37	42.5%	37	56.9%	χ2 = 1.99	N.S.
Married	45	51.7%	24	36.9%		
Separated/Divorced /Widowed	5	5.7%	4	6.2%		
High Educational Qualification						
Certificate or equivalent	21	24.1%	5	7.7%	χ2 = 9.97	N.S.
Diploma or equivalent	21	24.1%	11	16.9%		
Advanced Diploma or equivalent	4	4.6%	3	4.6%		
Bachelor's degree	39	44.8%	44	67.7%		
Master's, Doctorate, or equivalent	2	2.3%	2	3.1%		
Existing Co-Morbidities						
No	78	89.7%	53	81.5%	χ2 = 2.58	N.S.
Yes	6	6.9%	6	9.2%		
Unsure	3	3.4%	6	9.2%		
Work Characteristics						
Job Grade						
Others	5	5.7%	2	3.1%	χ2 = 0.10	N.S.
Enrolled nurse	5	5.7%	4	6.2%		
Senior enrolled nurse	9	10.3%	2	3.1%		
Registered nurse	41	47.1%	41	63.1%		
Senior registered nurse	24	27.6%	12	18.5%		
Nurse manager and above	3	3.4%	4	6.2%		
Clinical Experience						
Less than 1 year	1	1.1%	1	1.5%	χ2 = 1.39	N.S.
1 to 3 years	7	8.0%	3	4.6%		
4 to 5 years	3	3.4%	4	6.2%		
6 to 10 years	19	21.8%	18	27.7%		
11 to 15 years	26	29.9%	23	35.4%		
16 to 20 years	4	4.6%	6	9.2%		
More than 20 years	27	31.0%	10	15.4%		

Years at Organization						
Less than 1 year	16	18.4%	12	18.5%		
1 to 3 years	21	24.1%	21	32.3%	χ2 = 3.32	N.S.
4 to 5 years	8	9.2%	8	12.3%		
6 to 10 years	16	18.4%	14	21.5%		
11 to 15 years	5	5.7%	4	6.2%		
16 to 20 years	8	9.2%	2	3.1%		
More than 20 years	13	14.9%	4	6.2%		
Employment Type						
Full time	84	96.6%	65	100.0%	χ2 = 0.41	N.S.
Part time/locum/contract	3	3.4%	0	0.0%		
Working Hours Per Week						
44 hours or less	46	34.3%	2	11.1%	χ2 = 13.69	<0.01
More than 44 hours	88	65.7%	16	88.9%		
Shift Rotation						
Rotating shift	60	69.0%	54	83.1%	χ2 = 3.65	N.S.
Permanent day shift	7	8.0%	3	4.6%		
Permanent night shift	14	16.1%	6	9.2%		
Office hours	6	6.9%	2	3.1%		
	n	Mean	n	Mean		
Perceived workplace environment (PES - NWI)	87	28.09	65	23.83		
					U = 1199.0	<0.01
Personal Characteristics						
	n	Mean	n	Mean		
Resilience scores (BRCS)	87	14.86	65	14.54		
					U = 2575.5	N.S.
Personality						
Extraversion	87	8.977	65	8.338		
Agreeableness	87	11.816	65	11.046	U = 2474.0	N.S.
Conscientiousness	87	12.126	65	11.508	U = 2163.0	<0.05
Emotional stability	87	10.929	65	9.708	U = 2246.0	<0.01
Openness to experience	87	11.103	65	10.769	U = 1988.0	<0.01
					U = 2569.5	N.S.

N.S. Not significant; n - sample size; U - Mann–Whitney U test; BRCS - Brief Resilient Coping Scale; χ2 - Chi-squared test

Prevalence Rate of Workplace Bullying among Nurses

The study reported two prevalence rates based on a cut-off value of 33 and 45 as recommended by Notelaers & Einasrsen (2013), stated that a respondent with a NAQ-R score of 33 and above could be identified as "one experiencing bullying on an occasional basis or milder forms of bullying such as workplace incivility," while anyone with a score of 45 and above can be identified as "a victim of workplace bullying or experiencing constant bullying".

For the cut-off value of 33, our survey showed that 42.8% of the nurses (n =65) have reported experiencing occasional workplace bullying or workplace incivility during the past six months. Based on a higher cut-off value of 45, 11.8% of the nurses (n = 18) were identified as victims of workplace bullying during the past six months. Based on Table 2, there were significant differences in the NAQ-R scores between the bullied and non-bullied for both cut-off values. The mean score differences between groups were 18 points (cut-off value of 33) and 31 points (cut-off value of 45).

Association between the demographics, personal characteristics, and workplace environment and workplace bullying among nurses

Based on Table 1, the univariate analysis showed that nationality, working hours, personality, and work environment were associated with workplace bullying. Non-locals, nurses who work more than 44 hours per day, and those in a less positive work environment were more likely to report bullying experiences. The "bullied" staff also scored lower in certain personality traits: agreeableness (more likely to be antagonistic and competitive), conscientiousness (display fewer self-efficiency and unstructured behaviors), and emotional stability (display fewer positive feelings and thoughts).

Logistic regression was performed to evaluate the possible effects of demographics and personal and work characteristics on workplace bullying outcomes (cut-off value of 33). Three variables (working hours per week, personality –emotional stability, and work environment) were significant predictors of workplace bullying. Those who reported working more than 44 hours were 2.9 times more likely to experience workplace bullying (Odds ratio (OR) = 2.85, 95% C.I. 1.09 -7.43, $p< 0.01$). Nurses who displayed greater emotional stability were less likely to experience workplace bullying (OR = 0.73, 95% C.I. 0.58 – 0.92, $p< 0.01$). Nurses who worked in a positive workplace environment were less likely to experience workplace bullying than those working in a negative one (OR = 0.73, 95% C.I. 0.63 – 0.84, $p< 0.01$).

When the logistic regression evaluated the possible effects of demographics, personal and work characteristics on severe workplace bullying outcomes (cut-off value of 45), only one variable, the work environment, was identified as a significant predictor of workplace bullying. Nurses who worked in a positive workplace environment were less likely to experience workplace bullying than those working in a negative one (OR = 0.79, 95% C.I. 0.67–0.93, $p< 0.01$). The finding suggests that the workplace environment exerts a greater effect on severe and frequent bullying than other factors.

Consequences of workplace bullying on nurses

In terms of workplace consequences, the results show that workplace bullying significantly impacts nurses' job stress, job satisfaction, and turnover intention based on both cut-off values of 33 and 45 (Table 2). However, there were no significant differences in the nurses' work productivity and absenteeism between the bullied and non-bullied groups.

Table 2: Consequences of Workplace Bullying on Nurses (N = 152)

Consequences	Not Bullied (cut-off value of 33)		Bullied (cut-off value of 33)		Statistical test	*p*-Value
	n	Mean	n	Mean		
NAQ-R scores	87	26.3	65	44.37	U = 0.00	<0.01
Stress scores	87	40.1	65	51.0	U = 1105.5	<0.01
Job satisfaction	87	16.6	65	14.4	U = 1596.5	<0.01
Turnover intent (TIS-6 scores)	87	15.5	65	20.3	U = 1203.0	<0.01
	n	(% Within-group)	n	(% Within-group)		
Work Productivity					$\chi2 = 1.32$	N.S.
< 50%	3	3.4%	0	0.0%		
51 to 70%	2	2.3%	9	13.8%		
71 to 90%	44	50.6%	33	50.8%		
91 to 100%	38	43.7%	23	35.4%		

Absenteeism					$\chi2 = 0.14$	N.S.
0 days	16	18.4%	11	16.9%		
1 to 3 days	53	60.9%	37	56.9%		
4 to 10 days	12	13.8%	14	21.5%		
11 to 20 days	6	6.9%	3	4.6%		
	Not Bullied (cut-off value of 45)		Bullied (cut-off value of 45)		Statistical test	*p*-Value
	n	Mean	n	Mean		
NAQ-R scores	134	30.3	18	61.7	U = 0.00	<0.01
Stress scores	134	43.3	18	55.9	U = 352.0	<0.01
Job satisfaction	134	15.9	18	13.6	U = 581.5	<0.01
Turnover intent (TIS-6 scores)	134	16.9	18	22.2	U = 508.5	<0.01
	n	(% Within-group)	n	(% Within-group)		
Work Productivity					$\chi2 = 0.20$	N.S.
< 50%	3	2.2%	0	0.0%		
51 to 70%	10	7.5%	1	5.6%		
71 to 90%	65	48.5%	12	66.7%		
91 to 100%	56	41.8%	5	27.8%		
Absenteeism					$\chi2 = 0.43$	N.S.
0 days	24	17.9%	3	16.7%		
1 to 3 days	81	60.4%	9	50.0%		
4 to 10 days	21	15.7%	5	27.8%		
11 to 20 days	8	6.0%	1	5.6%		

N.S. Not significant; n - sample size; U - Mann–Whitney U test; BRCS - Brief Resilient Coping Scale; χ2 - Chi-squared test; NAQ – Negative acts questionnaire – revised; TIS –Turnover intent scale – 6 items.

DISCUSSION

Prevalence of Workplace Bullying Among Nurses in Singapore

In this study, the researchers had chosen to evaluate two types of workplace bullying based on the cut-off values of 33 and 45 as recommended by Notelaers & Einarsen (2013). The reference cut-off values were used to differentiate between two types of workplaces bullying namely: risks of workplace bullying (workplace civility or occasional bullying); and severe bullying/victims of bullying. The study results show that 42.8% of the respondents reported experiencing workplace incivility and occasional bullying over the past six months. About 12% were identified as victims of severe bullying based on the cut-off value of 45 (n = 18). Our findings are considerably lower as compared to many other nursing studies which generally range between 25% and 66.9% (Spector, Zhou & Che, 2014). They are also lower than the pooled mean estimates of 22%, 26.3%, and 61.9% based on three recent systematic reviews (Lever *et al.*, 2019; Kang & Lee, 2016; Varghese *et al*., 2022). In contrast, the results were similar to the prevalence rate of 11 to 18%, as reported by a non-nursing systematic review and meta-analysis that extracted 86 studies from various industry fields (Neilsen *et al.*, 2010). The differences in our results from those in other nursing studies might be due to variations in research methodology (Bambi *et al.* 2018), sociocultural influences (Karatuna, Jönsson, & Muhonen, 2020), and workplace culture (Pfefier & Vessey, 2017). Singapore is an Asian country with collectivism, multiculturalism, and Confucian values, whereby nurses might be more likely to exercise tolerance towards less-than-ideal workplace environments or even acts of bullying (Karatuna, Jönsson, & Muhonen, 2020; Yang & Zhou, 2021). Regardless of the differences, the study finding result (based on a NAQ-R cut-off value of 33) concurs with the three systematic reviews that showed that over 25% of nurses had suffered various forms of workplace bullying worldwide. The prevalence rate shows that workplace bullying has persisted and is likely to remain a constant challenge.

Antecedents of Workplace Bullying Among Nurses in Singapore

In terms of antecedents, the univariate analysis showed that four variables were associated with workplace bullying –

nationality, working hours, certain personality traits, and work environment. Non-locals, nurses who work more than 44 hours per day, and those who work in a less positive work environment were more likely to report bullying experiences (Table 1). The "bullied" staff were also more likely to demonstrate certain personality traits: agreeableness (more likely to be antagonistic and competitive), conscientiousness (display less self-efficiency and unstructured behaviors), and emotional stability (display fewer positive feelings and thoughts). The multiple logistic regression evaluated the mixed effects of variables and reported only three variables that were significantly associated with workplace incivility, milder forms, or occasional workplace bullying (based on a NAQ-R cut-off value of 33) – working hours, personality trait (emotional stability), and work environment. Nationality was not significantly associated with workplace bullying. When the effects of severe or frequent workplace bullying were examined (based on a cut-off value of 45), only one variable (workplace environment) was found to play a significant role in bullying events.

In terms of individual antecedents, the results were similar to a few Asian studies that confirmed the effects of several variables, specifically working hours and nationality (Oh , Uhm, & Yoon, 2016; Yokoyama *et al.*, 2016). However, the results contrast with many other Asian studies, which reported other significant variables, including age, years of experience or service, gender, and educational level (Karatuna, Jönsson, & Muhonen, 2020; Alyaemni & Alhudasithu, 2016). One reason to explain the differences in findings could be due to the different sociocultural influences. Many studies have a homogenous society as compared to Singapore, a multicultural country, where its healthcare system is heavily reliant on the overseas nursing workforce for staffing (Goh *et al*, 2019). This finding was similar to a study in Saudi Arabia, where a significant percentage of migrant nurses worked in their healthcare system and reported a higher bullying prevalence rate than local nurses (Al- Surimi *et al*, 2020). Another reason could be attributed to the power, and social hierarchy one holds within the workplace. According to several studies, overseas nurses face sociocultural differences and experience discrimination in treatment in the host countries (Pung & Goh, 2017; Balante , Broek, & White, 2021; Schilgen *et al.*, 2017). This situation could predispose these nurses to greater bullying and unfair treatment risks. In a comprehensive scoping review that examined 166 studies for sociocultural effects on workplace bullying among nurses, the researchers reported that minority ethnicity was more likely to experience workplace bullying in certain regions such as Anglo countries and Southern Asia, which are known to hire more percentage of overseas nurses than other region (Karatuna, Jönsson, & Muhonen, 2020). Our study observed that those who worked more than 44 hours were more likely to be overseas nurses, which could explain its significance. This observation might suggest the role of social hierarchy and power, thus reflecting the influence of sociodemographic variables across different countries. According to Karatuna, Jönsson, & Muhonen, (2020), social and workplace hierarchy tends to perpetuate in countries with high power-distance cultures, such as Singapore.

The study also found that one personality trait, agreeableness, was significantly associated with workplace bullying. Those who displayed lower agreeableness were less sympathetic with others, more self-centered, and less likely to display collectivist behaviors (Nielsen, & Einarsen, 2018). This trait could also be associated with lower emotional intelligence, making them targets of workplace incivility and bullying (Hutchinson, & Jackson, 2013; Nielsen, Glasø, & Einarsen, 2017).

In terms of work-related antecedents, there is an inverse relationship between work environment and workplace bullying, with nurses working in a negative environment being more likely to experience workplace bullying. This result is consistent with many studies, highlighting the importance of a positive work environment for nurses (Pfeifer & Vessey, 2017). Pfeifer and Vessey (2017) also highlighted the complex and dynamic associations between contributing variables and workplace bullying within the organization. They added that the role of leadership and immediate supervisors in mediating bullying events should not be overlooked as they observed that workplace bullying could occur in both Magnet® and non-Magnet® hospitals. For example, they reported that leaders with positive leadership styles were more likely to promote a healthy work culture, collegial relationships, open communication, and address staff and resource challenges than non-positive ones.

Consequences of Workplace Bullying on Nurses

The study shows that workplace bullying significantly impacts nurses' job stress, job satisfaction, and turnover

intention but does not affect their work productivity or absenteeism. This finding suggests the direct effect of workplace bullying on nurses' psychological health and organizational consequences, such as staff satisfaction and attrition. The result concurred with a meta-analysis by Nielsen and Einarsen (2012) which found significant associations between bullying exposure and job-related impact and health outcomes. The same review showed that the effects of workplace bullying on absenteeism, performance, self-perceptions, and sleep were not significant. Several nursing reviews have examined workplace bullying and shown that it has many detrimental consequences, not only in terms of the health and well-being of nurses but also in terms of the safety of patients (Hartin, Birks, & Lindsay 2018; Lever *et al.*, 2019).

Study Limitations

The present study has two main limitations. First, this study employed a cross-sectional design at a single hospital in Singapore and involved 152 nurses. The design and sample size could limit the findings' generalisability to other hospitals and nurses in Singapore (Polit & Beck, 2018). Nevertheless, the inconsistent results reported by different nursing studies showed that workplace bullying is highly contextual and would need to be evaluated separately. This study can serve as a reference for future research in Singapore. Second, the study utilized self-report and might not fully measure the extent and effect of bullying and its related variables. Also, other variables such as leadership styles and coping abilities were not evaluated. The omission of some variables could mean that their effects were not observed in our study.

Recommendations for Research

First, our literature review highlighted the limited studies that examine the extent of workplace bullying in Singapore and Southeast Asia. In the review by Varghese *et al.*, they found that most of the studies were conducted in East Asia and Australia. However, less than five studies were conducted in this region. More studies are needed in this region. This study can serve as a basis for more local studies to reveal the commonalities and differences in the extent, antecedents, and consequences of workplace bullying across different workplace settings in this region. Second, this study demonstrates the persistent nature of workplace bullying and highlights a need for researchers and clinicians to develop effective strategies to address workplace bullying at their workplace. Currently, several reviews report a dearth of literature evaluating the effectiveness of workplace bullying interventions in healthcare (Stagg, & Sheridan, 2010; Gillen, *et al*., 2017; Rutherford, Gillespie, & Smith, 2019). Finally, this study highlights the role of the work environment and leadership in workplace bullying over individual factors, which could pave the way for organizational-level interventions to support and promote a safe workplace for bullying victims. Hospital directors and managers could undertake preventive measures to identify groups vulnerable to bullying and subsequently craft appropriate coping strategies and mentoring programs to curb bullying (Awai, *et al.*, (2021).

CONCLUSION

In summary, this is the first study to report the extent and impact of workplace bullying among nurses in Singapore and contributes to the growing number of studies within Asia. The difference in our findings from other Asian studies reflected the different sociocultural contexts of multicultural Singapore. It also showed the complexity and diversity of the phenomenon. The study demonstrates that workplace bullying will continue to persist and manifest differently in different countries, reflecting the power, demographics social disparities within the workplace settings. The implications of the study also reveal that workplace environment and hierarchy exert a greater and more immediate effect on workplace bullying than individual characteristics, which vary and reflect the social position that the victims of bullying hold within the workplace. The finding supports nursing leaders to play an active role in mediating the impact of workplace bullying as they are in a position of power to promote a positive work environment and mitigate workplace bullying events.

Conflict of Interest

The authors declare that they have no conflict of interests.

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