



UNIVERSITI PUTRA MALAYSIA

***PREVALENCE OF WORKPLACE VIOLENCE AMONG HEALTHCARE
WORKERS IN A HEALTH DISTRICT IN SELANGOR AND ITS
ASSOCIATED FACTORS***

MOHD SAFWAN BIN IBRAHIM

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By

MOHD SAFWAN BIN IBRAHIM

**Dissertation Submitted to the Department of Community Health,
Faculty of Medicine and Health Sciences, Universiti Putra Malaysia,
in Fulfilment of the Requirements for the Degree of Master of Public
Health**

August 2017

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August 2017

Chairman : Dr Ahmad Azuhairi bin Ariffin
Faculty : Medicine and Health Sciences

Introduction: Workplace violence is incident where staff are abused, threatened or assaulted in circumstances related to their work, including commuting to and from work, involving an explicit or implicit challenge to their safety, well-being or health. It can be as mild as verbal abuse to a very serious condition such as homicide. Currently, there is no well establish reporting system or surveillance in healthcare setting specifically on workplace violence especially for violence which did not cause any physical injury. Published research on prevalence of healthcare workplace violence in Malaysia is very limited and only focus on nurses especially in the hospital.

Objectives: This study aims to determine the prevalence of workplace violence among healthcare workers in Gombak health district and to determine its associated factors

Methodology: This is a cross-sectional study using proportionate stratified random sampling according to occupation among 481 healthcare workers in Gombak Health District. Face to face interview using structured questionnaire were done in this study. The questionnaire consists of three parts which are personal and workplace data, workplace violence and psychosocial factor. The workplace violence is any violence in any circumstances related to work occurred within 6months prior to this study. After obtaining consent, the participants were interviewed and the answers were transferred to the structured questionnaire. The data were then analysed using descriptive, chi- squared test and multiple logistic regression.

Results: Out of the 481 eligible samples, 441 participants agreed to participate giving a response rate of 91.7%. Around three quarter of the respondents was female. The median age was 31 years old. Majority of the respondents occupation were nurses or midwives (37.9%) followed by Health and Environmental Officer or Assistant Health and Environmental Officer (18.4%). The median working experience was 7 years. Around half of the respondents (48.5%) work in outpatient clinic and followed by 27.4 % of them working in maternal and child clinic. The prevalence of workplace violence among healthcare workers of Gombak Health District was found to be 24.3%. Among all risk factors studied, education level, occupation, main workplace setting, numbers of staff in workplace and job demand were found to have significant association with workplace violence. These factors were then analyzed using multiple logistic regression and only occupation, main workplace setting and job demand were significant enough to predict workplace violence.

Conclusion: The prevalence in this study is comparable with the study in other country using the same definition of 6 months timeframe for workplace violence. In this study, it was found that occupation, main workplace setting and job demand were significant predictors of workplace violence.

Keyword: workplace violence, healthcare workers, Gombak Health District office

Abstrak disertasi yang dikemukakan kepada Jabatan Kesihatan Komuniti,
Universiti Putra Malaysia sebagai memenuhi keperluan untuk Ijazah Sarjana
Kesihatan Awam

**KADAR KEGANASAN TEMPAT KERJA DI KALANGAN PEKERJA
KESIHATAN DI SALAH SATU PEJABAT KESIHATAN DAERAH DI
SELANGOR DAN FAKTOR-FAKTOR YANG MEMPENGARUHINYA**

Oleh

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Pengenalan: Keganasan tempat kerja adalah kejadian di mana kakitangan didera, diugut atau diserang dalam keadaan yang berkaitan dengan kerja mereka, termasuk berulang-alik ke dan dari tempat kerja, yang melibatkan cabaran tersurat atau tersirat ke atas keselamatan mereka, kesejahteraan atau kesihatan. Ia boleh terjadi dalam banyak keadaan seperti penderaan lisan kepada keadaan yang sangat serius seperti pembunuhan. Pada masa ini, tidak ada sistem pelaporan atau pengawasan yang baik dalam keganasan tempat kerja terutamanya keganasan yang tidak menyebabkan kecederaan fizikal. Penyelidikan mengenai kadar keganasan di tempat kerja dikalangan warga kesihatan di Malaysia adalah terhad dan hanya tertumpu kepada hospital dan jururawat.

Objektif: Objektif kajian ini adalah untuk mengetahui prevalen keganasan tempat kerja di kalangan pekerja kesihatan di Pejabat Kesihatan Daerah Gombak dan faktor-faktor berkaitan dengan kejadian tersebut.

Methodologi: Kajian ini merupakan kajian irisan lintang yang menggunakan kaedah persampelan rawak berstrata berkadar mengikut pekerjaan di kalangan 481 pekerja kesihatan di fasiliti di bawah Pejabat Kesihatan Daerah Gombak. Wawancara bersemuka dengan menggunakan soal selidik berstruktur telah dilakukan dalam kajian ini. Soal selidik terdiri daripada tiga bahagian iaitu data peribadi dan tempat kerja, keganasan di tempat kerja dan faktor psikososial. Keganasan di tempat kerja adalah keganasan yang berkaitan dengan pekerjaan dan berlaku dalam tempoh 6 bulan sebelum kajian ini dilakukan. Setelah mendapatkan persetujuan, peserta ditemubual dan jawapannya dipindahkan ke soal selidik berstruktur. Data tersebut kemudiannya dianalisis menggunakan ujian deskriptif, ujian chi-squared dan multiple logistic regression.

Hasil kajian: Daripada 481 sampel yang layak, 441 responden bersetuju untuk menyertai kajian ini dan menjadikan kadar respon sebanyak 91.7%. Tiga perempat daripada responden terdiri daripada responden wanita. Median umur responden adalah 31 tahun. Kebanyakan responden terdiri daripada jururawat (37.9%) diikuti oleh Pegawai Kesihatan dan Persekitaran (18.4%). Median pengalaman bekerja adalah 7 tahun. Hampir separuh daripada responden bekerja di klinik pesakit luar (48.5%), diikuti oleh 27.4% bekerja di klinik ibu dan anak. Kadar keganasan tempat kerja di Pejabat Kesihatan Daerah Gombak adalah sebanyak 24.3%. Antara faktor risiko yang dikaji, tahap pendidikan, pendudukan, penentuan tempat kerja utama, bilangan kakitangan di tempat kerja dan permintaan pekerjaan didapati mempunyai hubungan yang signifikan dengan keganasan di tempat kerja. Faktor-faktor ini kemudian dianalisa dengan menggunakan multiple logistic regression dan hanya pekerjaan, tempat kerja utama dan permintaan pekerjaan merupakan faktor peramal bagi keganasan tempat kerja.

Kesimpulan: Kadar keganasan tempat kerja dalam kajian ini adalah hampir sama dengan kajian di negara lain yang menggunakan definisi yang sama iaitu keganasan di tempat kerja dalam tempoh 6 bulan untuk. Dalam kajian ini, didapati bahawa jenis pekerjaan, tempat kerja utama dan permintaan kerja merupakan faktor peramal bagi keganasan tempat kerja.

Kata kunci: keganasan tempat kerja, pekerja kesihatan, Pejabat Kesihatan Daerah Gombak

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I certify that a Thesis Examination Committee has met on 3rd August 2017 to conduct the final examination of Mohd Safwan Bin Ibrahim on his thesis entitled “Prevalence of workplace violence among Healthcare workers in a health district in Selangor and its associated factors” in accordance with the Universities and University Colleges Act 1971 and the Constitution of the Universiti Putra Malaysia [P.U.(A) 106] 15 March 1998. The Committee recommends that the student be awarded the Master of Public Health.

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LIST OF ABBREVIATIONS

AOR	-	Adjusted odds ratio
CI	-	Confidence interval
CSEW	-	Crime Survey for England and Wales
DCSQ	-	Swedish Demand Control Support Questionnaire
df	-	Degree of freedom
ICN	-	International Council of Nurses
ILO	-	International Labour Office
IQR	-	Interquartile range
MCH	-	Maternal and child health clinic
OPD	-	Outpatient department clinic
OR	-	Odds ratio
PMR	-	Penilaian Menengah Rendah
PSI	-	Public Services International
S.E.	-	Standard error
SPM	-	Sijil Pelajaran Malaysia
UPM	-	Universiti Putra Malaysia
WHO	-	World Health Organization

CHAPTER 1

INTRODUCTION

1.1 Background

Public health service in Malaysia is centrally governed by the Ministry of Health through Federal, State and District Level (Jaafar et al., 2013). It consists of National, State Health Departments and District Health Office. District Health Office plays a role in basic functional level in healthcare system including family health, primary care, disease control, occupational health, food quality control, health education and promotion and also environmental health and water supply services (Liyanatul et al., 2016). Thus, it requires complex interaction between inter-agencies and intra-agencies to function as a whole.

Gombak Health District is one of the District Health Offices under Selangor State Health Department. It has 10 Health clinics, 4 community clinics and 4 Malaysia clinics and one District Health Office. Gombak District which is located in Selangor, consists of four sub districts which are Hulu Kelang, Setapak, Batu and Rawang. (Department of Statistics Malaysia, 2015).

Workplace violence is an unwarranted behaviour including physical abuse and intimidation toward employee at workplace and hospital workers have more risk of non-fatal workplace violent than all private sector industries (Centers for Disease Control and Prevention, 2002). The average risk of workplace violence for health professional is 2.5 which is the third after health and social care associate professional and protective service occupations such as police officers (Health and Safety Executive, 2017). Workplace violence can be as mild as verbal abuse to a very serious condition such as homicide. One of the example was a case in which a dermatologist in Chicago was murdered by his former patient in 2006 (Kuehn, 2010). Being healthcare provider for community, Gombak Health District staffs are also at risk of this occupational hazard.

1.2 Prevalence of workplace violence in different region

In 2013, the estimated rates of nonfatal workplace violence against health care workers in private-sector and state in-patient facilities—including hospitals and nursing and residential care facilities in the United States are from 5 to 12 times higher than the estimated rates for workers overall (Sherrill, 2016). In the same year, the estimated rate of workplace violence injuries for all private-sector workers was 2.8 per 10,000 workers, 14.7 per 10,000 for private-sector hospital workers was workers, and 35.3 per 10,000 for nursing and residential care workers (Sherrill, 2016). Moreover, reported nonfatal workplace violence against health care workers showed increasing trend in recent years with incement of 12 percent cases over 2 years, from an estimated 22,250 reported cases in 2011 to an estimated 24,880 in 2013 (Sherrill, 2016).

A meta-analysis of 136 studies on 151,347 nurses worldwide showed that non-physical violence experienced by 67.2% of the nurses, physical violence experienced by 36.4% of nurses, 37.1% experienced being bullied and 27.9% experienced sexual harassment (Spector, Zhou, & Che, 2014). Workplace violence was experienced by 61.3% of the nurses in Middle East region, 58.3% of the nurses in Anglo region, 51.3% in Asia region and 38.3% in the Europe region (Spector et al., 2014). Prevalence of workplace violence among healthcare workers in a cross-sectional study in Singapore is 70% out of 496 respondents (Chan, Chan, & Kee, 2013). In Thailand, 54.1% out of 1090 healthcare workers had experienced workplace violence with verbal violence being the commonest followed by bullying, physical violence and sexual harassment (Sripichyakan, Kasara, Pathraporn Thungpunkum, & Bungorn Supavititpatana 2003).

1.3 Problem statement

According to the Bureau of Labor Statistic United States, violence and other injuries by persons in health care and social assistance industries account for 4.2% out of all non-fatal occupational injuries in 2015 (Bureau of Labor Statistic United States, 2015) and 24.7% out of fatal occupational injuries 2015 in United States (Bureau of Labor Statistic United States, 2016). Thus, workplace violence contributes to a portion which should not be ignored.

Workplace violence bring about direct and indirect impact. In a retrospective database review of 106 cases of workplace violence in United States, the average patient care provider lost time was 11 days ($n = 6$, 66 total days) and the total charges for those ($n=30$) requiring treatment were \$94,156 (mean, \$2,631) (Speroni, Fitch, Dawson, Dugan, & Atherton, 2014). In a report review about the Washington State, USA the cost that incurred due to workplace violence from 2010 through 2014 were estimated between \$4 million and \$8 million each year in workers' compensation costs and medical treatment (Sherrill, 2016).

A systematic review by Lanctôt and Guay (2014) on sixty eight studies of healthcare workplace violent found that there are seven categories of consequences of workplace violent which are physical, psychological, emotional, work functioning, quality of care, social, and financial. Out of these, the most common and crucial consequences were posttraumatic stress and negative emotional consequences and work functioning impairment (Lanctôt & Guay, 2014).

In Malaysia, the Occupational and Environmental Health unit of the Ministry of Health is the unit responsible for maintaining the government health workers' safety and health and prevention on health problems arise from work. It is also responsible for surveillance programmes and occupational health and safety training of healthcare workers (Jemoin, 2006). Through the Occupational Safety and Health Act of 1994 (Act 514) and Notification of Accident, Dangerous Occurrence, Occupational Poisoning and Occupational Disease Regulations 2004, an employer is required to notify to the nearest Department of Occupational Safety and Health office of any accident, dangerous occurrence, occupational poisoning and occupational disease that has occurred in the place of work. Occupational disease, occupational injuries and

occupational poisoning surveillance through notification from public health facilities started in 1997 (Sirajuddin et al., 2001). Another established surveillance programme is sharp injury surveillance which is to provide data for prevention strategies (Ministry of Health Malaysia, 2007). However, there is no well established reporting system or surveillance in healthcare setting focusing specifically on workplace violence especially for violence which did not cause any physical injury.

The workers are protected from workplace violence under the Malaysian Occupational Safety and Health Act 1994. Department of Occupational Safety and Health under Ministry of Resource had come out with a guideline for the prevention of stress and violence in workplace mainly discussing on approach toward violence, recognition, assessment, intervention program, monitoring and evaluation (Di Martino & Musri, 2001). Despite that studies done showed that violence still occur in workplace. Published research on the prevalence of healthcare workplace violence in Malaysia is very limited and only focused on nurses especially in hospital.

Prevalence of sexual harassment among 455 nurses in Hospital in Melaka State, Malaysia in a cross-sectional study is around 51.2% (Suhaila & Rampal, 2012). A cross-sectional study among 108 healthcare workers in a hospital in Kuala Lumpur, Malaysia showed that 42.6% of the workers have experienced being harassed or bullied or mobbed (Yusop, Dempster, & Stevenson, 2014). Another cross-sectional study done among 55 nurses in Universiti Kebangsaan Malaysia Medical Centre, Malaysia showed different finding of 3.7% prevalence of workplace violence (Ruth, Samsiah, Hamidah, & Lp, 2009). However, this study was limited to voluntary sampling.

Limited published literatures are available on the prevalence of healthcare workplace violent in outpatient primary care or community based setting in Malaysia. Prevalence of workplace violence in this setting need to be studied because the burden in health clinic in term of patient load is more compared to hospital setting. According to Health Facts 2016, attendances at health clinics nationwide in 2015 (38,311,223) were 14 millions more than hospital admission, hospital outpatient attendances and hospital day care attendances combined (23,986,404).

This study was conducted among healthcare workers of Gombak Health District which includes clinical staffs, supporting staffs and public health field workers.

1.4 Research Question

- a) What is the prevalence of workplace violence among healthcare workers in Gombak Health District?
- b) Who are the perpetrators of violence?
- c) Is there any factor associated with workplace violence among healthcare workers in Gombak Health District?
- d) What are the predictors of workplace violence among healthcare workers in Gombak Health District?

1.5 Objectives of the study

1.5.1 General Objective

To determine prevalence of workplace violence among healthcare workers in Gombak Health District Health and its associated factors.

1.5.2 Specific Objectives

1.5.2.1 Descriptive Objective

- a) To determine the socio-demographic characteristics of healthcare workers in Gombak Health District
- b) To determine the prevalence of workplace violence among healthcare workers in Gombak Health District
- c) To determine the type workplace violence, time, day and place of occurrence, and to identify the perpetrators of workplace violence

1.5.2.2 Analytical Objectives

- a) To determine the association between socio-demographic characteristics and workplace violence among healthcare workers in Gombak Health District.
- b) To determine the association between work factors (working experience, main workplace setting, physical contact with patient, working after office hour, working during weekend or public holiday and number of staff in workplace) and workplace violence among healthcare workers in Gombak Health District.
- c) To determine the association between psychosocial environment work factor (job demand, job control and job support) and workplace violence among healthcare workers in Gombak Health District
- d) To determine the predictors of workplace violence among healthcare workers in Gombak Health District

1.6 Hypothesis

- a) There is significant association between socio-demographic characteristics and workplace violence among healthcare workers in Gombak District Health.
- b) There is significant association between work factors (working experience, main workplace setting, physical contact with patient, working after office hour, working during weekend or public holiday and number of staff in workplace) and workplace violence among healthcare workers in Gombak District Health.
- c) There is significant association between psychosocial environment work factor (job demand, job control and job support) with workplace violence among healthcare workers in Gombak Health District.

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