RESEARCH ARTICLE

Suicidal ideations: The role of emotional intelligence and hopelessness among police in Malaysia

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ABSTRACT

Suicide has become an alarming phenomenon among the Royal Malaysia Police (RMP) with reported cases showing an increase each year. This cross-sectional study examines the association between depression, emotional intelligence (EI), hopelessness, and the prediction of suicidal ideation among police officers in Malaysia. A total of 2,508 police officers in 15 police contingents and the Royal Malaysia Police Head Quarters completed the questionnaires. The Beck Depression Inventory (BDI) was used to measure depression, and the Wong and Law Emotional Intelligence Scale (WLEIS) was employed to calculate overall emotional intelligence. The hopelessness variable was measured via the Beck Hopelessness Scale (BHS). The Revised Suicide Ideation Scale (R-SIS) was used to measure the tendency and severity of suicidal intention. The data were analysed using Statistical Package for the Social Sciences (SPSS) version 29.0. The study found that emotional intelligence showed a significant negative correlation with suicidal ideation. Depression and hopelessness were significantly positively correlated with suicidal ideation. Further analysis using the logistic regression approach (stepwise) revealed that both depression, and hopelessness, were risk factors that influenced suicidal ideation among the police. Mediation analyses show that emotional intelligence and hopelessness act as mediators in the relationship between depression and suicidal ideation. Therefore, mental health professionals can design appropriate prevention and intervention programmes for those with suicidal ideation.

Keywords: suicidal ideation; emotional intelligence; hopelessness; police

1. Introduction

Suicide has been among the most discussed concerns during and post COVID-19. In 2022, the World Health Organization announced that, worldwide, suicide is among the top 10 leading causes of death^[1]. Even though in Malaysia the suicide rate is still considered low, it is alarming as is the situation involving the police officers in the Royal Malaysia Police (RMP). Currently, the trend of suicide is increasing and worth attention^[2, 3]. From 2020 to 2023 twelve cases were reported involving police officers^[3]. By definition, suicide includes three components suicidal ideation, suicidal behaviour, and completed suicide.

In every reported suicide case, it is revealed that suicidal ideation and suicidal behaviour are more common than complete suicide and that suicidal ideation is a robust predictor of suicidality^[4, 5]. This is due to

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the stigma of having mental health issues and the police culture that promotes resiliency^[6-8], and masculinity^[9] which lead to accusations of a lack of credibility in terms of pride in wearing the blue uniform. Moreover, simply knowing the number of suicide cases is too late whereas knowing the incidence of suicidal ideation might help in introducing the right channel for help and advocacy. To date, according to the researchers' findings, no specific theory has discussed depression, emotional intelligence, or hopelessness, as predictors of suicidal ideation in one framework.

Although studies from several countries report the prevalence of suicide among police-Tanzania $(15.4 \ \%)^{[10]}$, Nigeria $(14\%)^{[11]}$, Italy $(1.2\%)^{[12]}$, and Norway $(6.4\%)^{[13]}$. A comparison of the previous prevalence of suicide in the RMP has not been found. Other studies- China $(16.4\%)^{[14]}$, Singapore $(6.7\%)^{[15]}$, Hong Kong $(10.9\%)^{[16]}$, New Zealand $(10.2\%)^{[17]}$, and Taiwan $(15.2\%)^{[18]}$ -report the prevalence of suicide in the general population. The suicide prevalence in the general population of Malaysia is $5.5\%^{[19]}$ and previous research revealed that the prevalence of suicidal ideation among Malaysian youth is 6.2% with ages 16 to 24 years having the highest risk of suicidal behaviour^[20]. In terms of ethnicity, the prevalence of suicide is highest among Malaysians of Indian ethnicity (17.9\%) followed by ethnic Chinese (10.7\%), ethnic Malays (4.6\%), and finally the other minority ethnic groups in Malaysia^[20]. Other socio-demographic factors considered risk factors for suicide in Malaysia include females (suicidal ideation), males (suicidal behaviours), depression, anxiety, stress, hopelessness, lack of connectedness, interpersonal problems, sexual abuse, substance abuse, bullying, and unemployment^[20].

Joiner's Theory of Suicidal Behaviour^[21] proposes that suicidal desire is caused by the simultaneous presence of two interpersonal constructs;- thwarted belongingness and perceived burdensomeness. Suicidal behaviour in this theory explains the suicidal ideation, communication, or behaviour to die (attempt) rather than the suicide itself. Suicide attempts possess qualities including 1) self-initiated, potentially injurious behaviour; 2) presence of intent to die; and 3) non-fatal outcome. Meanwhile, according to the Three-Step Theory of Suicide by Klonsky and May, suicidal ideation begins with feelings of pain (e.g. psychological or physical) and hopelessness^[22]. Low or absent connectedness and worsening suicidal ideation later lead to suicidal planning. Finally, whether a suicide attempt is made depends on several other contributing factors, for example, habituation to fear, injury, or death.

O'Connor^[23] later suggested why people die by suicide, with a particular focus on the psychology of the suicidal mind. O'Connor recognised that suicide is characterised by a complex interplay of biology, psychology, environment, and culture that affects individuals. Threats like life events, social problem-solving, coping, ruminative process, memory biases, thwarted belongingness, burdensome, future thoughts, attitudes, norms, social support, and resilience affect the formation of suicidal ideation/intention^[23]. These theories describe the correlation of emotional intelligence, and hopelessness indirectly with suicidal ideation. However, there are limited or a lack of simultaneous theories that interplay these three variables as protective and risk factors with suicidal ideation.

Despite the limitation, several studies show the relationship between depression, emotional intelligence, and hopelessness with suicidal ideation among police. Suicidal ideation is strongly linked with emotional distress and a strong predictor of attempted or actual suicide^[24]. One mental health problem associated with suicidal ideation in the police force is depression^[24]. Severe depression affects one's emotional state and has great clinical and social relevance^[25]. Depression is a common risk factor for being vulnerable to police with an increased risk of suicidal ideation^[26,27]. Meanwhile, police with depression and low support intertwined in predicting suicidal ideation^[23]. Police who screened positive for depression, anxiety, panic disorder, alcohol abuse, and post-traumatic disorder were reported as being significantly associated with suicidal ideation and

planning but not attempting^[26]. In a systematic review, Krishan et al.^[27] concluded that five risk factors contribute to suicide risk problematic substance use, depression, previous history of suicide attempt, differences in trauma responses, and exposure to excessive, and prolonged job-related stress.

A study has documented that Malaysian police officers demonstrated higher emotional intelligence, particularly in operations and administration^[28]. Kanesan^[28] quoted previous findings in which police were found to be specifically high in intrapersonal emotional intelligence. This enables them to reduce and regulate their negative emotions, be motivated, and take appropriate action to perform their job. Furthermore, having high interpersonal emotional intelligence helps police to be positively cultivated in their social working environment. Hence, it can be concluded that emotional intelligence has an impact on the psychological well-being of members of the police force and helps eliminate stress caused by tiredness. Police with higher emotional intelligence are better equipped to deal with traumatic or stressful events and have higher self-control and self-awareness^[29].

Although, research concerning the association of emotional intelligence with suicidal ideation is limited, several studies have made clear statements about the association. For example, Akurahi^[30] reported that the emotional intelligence domains of adaptability and sensitivity significantly influence suicidal ideation. Meanwhile, Zhou et al.^[31] found a notably strong negative correlation between both variables and proposed that emotional intelligence serves as a fundamental component in intervention for suicidal ideation. Emotional intelligence is deemed to play an important role in protecting against suicidal behaviour and is suggested as an essential focus in the integration of suicidal prevention programmes^[32].

Civilotti's^[33] study examining the prevalence of hopelessness and its association with depression, burnout, and suicidality, reported a significant association between hopelessness and depression, and burnout associated with suicidal thoughts. The study by Violanti et al.^[34] examined specific stressors that may be associated with hopelessness, a possible risk factor for suicide among police officers, and concluded that hopelessness is associated with specific stressors in police work. The study indicated that hopelessness rose significantly to its highest level as the lack of organisational support increased. Only a few studies have sought to determine the association between hopelessness and suicidal ideation among the police with most considering hopelessness as being among the symptoms of stress, burnout or depression, lack of coping mechanisms, and psychiatric disorders, or the association of suicidal ideation with other mental health issues^[35-38].

Several studies involving non-police officers show a significant correlation between hopelessness and suicidal ideation. The research by Eskelinen et al.^[39] involving healthy study subjects with benign breast disease and breast cancer patients, found that hopelessness or helplessness was significantly correlated with suicide ideation. The study of De Berardid et al.^[40] also showed a positive correlation between hopelessness and suicide ideation using the Beck Hopelessness Scale (BHS). The multiple regression analyses of Uncapher et al.^[41] revealed that while hopelessness was strongly related to suicidal ideation, the relationship between hopelessness and suicidal ideation was dependent on the level of depression. Another study also showed that hope and hopelessness interacted with the effect of hopelessness on suicidal ideation being lower in individuals with higher hope than among individuals with lower hope^[42]. A recent study by Ribeiro et al.^[43] concluded that depression and hopelessness confer a risk of suicide ideation, attempt, and death. Hopelessness was found to be the strongest predictor of suicide ideation in that study. Wolfe et al.^[44] corroborated the finding that hopelessness is positively related to suicidal ideation in research involving 158 samples of depressed male and female adolescent youth.

Unfortunately, only a limited number of studies investigate the role of emotional intelligence and hopelessness as protective and risk factors respectively in predicting suicidal ideation, particularly in Malaysia and among police officers. Therefore, this research constitutes a milestone among the beneficial mechanisms identifying and preventing suicidal ideation at an early stage among police officers through a campaign of mental health promotion, that offers new modules, professional help, and elimination of the stigma of help-seeking among police. Furthermore, this research presents a new paradigm for the RMP to identify the specific needs of the police and facilitate to counselling in the organisation. Realising the importance of understanding the association of these factors with suicidal ideation among local police, this study aims to find the correlation between emotional intelligence, and hopelessness, and to determine the influence of these factors on the police in Malaysia.

2. Materials and methods

2.1. Research objects

In this cross-sectional study, 5,500 physical forms, google forms, and emails were distributed to all the respondents in 15 police contingents across Malaysia including the police headquarters of Bukit Aman. They were selected based on the stratified random sampling method. The researchers tried to achieve 5,350 based on the sample size calculator using the Roasoft formula^[45] and Krejcie and Morgan^[46]. However, only 2,928 were recovered, and only 2,508 were valid; the recovery rate was 53.2%. Only police officers aged between 19 and 59 years who signed the informed consent column and were still in active service in the Royal Malaysia Police (RMP) were taken into consideration in this study. The respondents had to choose "agree and volunteer to participate" before finally answering the questionnaires. All responses were treated with confidentiality and safety following the Research Ethics requirements. The demographic variables included gender, rank, task or position, marital status, educational background, monthly income, and department.

2.2. Research hypothesis

This study puts forward the following assumptions:

Hypothesis 1: There is an association between socio-demographic factors and suicidal ideation among

police officers.

- Hypothesis 2: There is a relationship between the three variables of depression, emotional intelligence, hopelessness and suicidal ideation among police officers.
- Hypothesis 3: The factors of depression, emotional intelligence, and hopelessness influence suicidal ideation among police officers.
- Hypothesis 4: Emotional intelligence and hopelessness as mediators have a role in the relationship between depression and suicidal ideation among police officers.

2.3. Measuring tool

2.3.1. The revised suicide ideation scale (R-SIS)

The Revised Suicide Ideation Scale (R-SIS) was developed by Rudd^[47]. It consists of 10 items to measure the level of suicide ideation or intention among adolescents and adults in both clinical and nonclinical samples. The R-SIS has five Likert options of 1 (never) to 5 (many times). The respondents were required to respond to each statement describing their feelings or behaviour over the previous year. R-SIS showed excellent psychometric properties. In terms of reliability, the internal consistency test showed a high or effective Cronbach's alpha of 0.86 and an inter-item correlation ranging from r = 0.45 to $0.74^{[47]}$. The scores for this scale ranged from 10 to as high as 36. The cut-off scores set were $\geq 15^{[47,48]}$. The Malay version was adapted from previous research by Halim et al.^[49] In this study, the internal consistency coefficient of R-SIS was 0.82.

2.3.2. Beck depression inventory (BDI)

The Beck Depression Inventory-21 is a self-reporting rating inventory that was developed by Aaron T. Beck. It comprises 21 items with multiple choices to measure characteristic attitudes and symptoms of depression^[50]. However, in this study, only 20 items were retained after the pilot study to comply with the cultural context and sensitivity in Malaysia. Each item of BDI was scored from '0' to '3". For this study, the cut-off set was ≥ 10 as it signifies clinically significant depression^[51]. Internal consistency for the BDI ranged from 0.73 to 0.92 with a mean of $0.86^{[52]}$. The BDI demonstrated high internal consistency, with alpha coefficients of 0.86 and 0.81 for psychiatric and non-psychiatric populations respectively^[52]. The BDI has been previously validated in Malaysia^[53,54]. In this study, the internal consistency coefficient was 0.91.

2.3.3. Wong and law emotional intelligence scale (WLEIS)

The Wong and Law Emotional Intelligence Scale is a self-report measure composed of four dimensions with 16 items. It was theorised and designed by Wong and Law^[55]. *The researchers used the Malay version of 16 items*^[56]. *This scale measures the perception of the individual's own emotional abilities*. This scale uses an ordinal response format (5-point Likert) presented in each item from 1 (strongly disagree) to 5 (strongly agree). The four subscales or factors of WLEIS are (1) Self-emotion appraisal (SEA); (2) Other's emotion appraisal (OEA); (3) Use of emotion (UOE); and, (4) Regulation of emotion (ROE). WLEIS has been used widely in different cultures and for various demographics. It has demonstrated good internal consistency and correlated highly with each other. In this study, the internal consistency coefficient was 0.95.

2.3.4. Beck hopelessness scale (BHS)

The Beck Hopelessness Scale (BHS) is a 20-item self-report inventory developed by Dr. Aaron T. Beck^[57]. BHS was designed to measure three major aspects of hopelessness: feelings about the future, loss of motivation, and expectations. It is a true-false test designed for adults. It measures the extent of the respondent's negative attitudes, or pessimism, about the future. It can also be used as an indicator of suicidal risk in depressed people who have made suicide attempts. BHS is a well-validated instrument with adequate reliability^[58]. *The researchers adapted the* BHS *version that suits Malaysian respondents*^[59]. Beck et al.^[58] through research on psychiatric patients who had attempted suicide, provided the cut-off \geq 9 as severe hopelessness. Quite recently, Balsamo^[60] reported \geq 15 as the cut-off score for severe hopelessness during the study of 492 psychiatric hospitalised adult patients diagnosed with Bipolar Disorder Type II. The researcher was keen to score \geq 15 as the cut-off point for severe hopelessness as the respondents in this study are non-clinical and hypothesised to constitute minimal hopelessness or suicidal risk. In this study, the BHS had good internal consistency with a coefficient of 0.78.

2.4. Data processing

The raw data were keyed into the Statistical Package for the Social Sciences (SPSS) version 29. Descriptive analysis was used to describe the demographic data. To measure the relationship between depression, emotional intelligence, hopelessness, and suicidal ideation. The Spearman's rho correlation coefficient was employed as the data on suicidal ideation were not normally distributed. Spearman's rho is a nonparametric statistical technique that does not assume that each variable is normally distributed and can be

used when the normality assumption is not met^[61]. Logistic regression was conducted to determine the influence of emotional intelligence and hopelessness on the suicidal ideation of the police.

3. Results

3.1. Demographics profile

A total of 2,508 police officers from the Royal Malaysia Police in 15 police contingents, including the Royal Malaysia Police Headquarters (Bukit Aman), were involved in this study. The demographic analysis in **Table 1** shows that there were 1,928 (76.9%) males and 580 (23.1%) females. The majority of the respondents were Malays (79.1%) and Muslims (87.5%). The overall prevalence of depression was 32.9% and suicidal ideation was 6.7% among the police in Malaysia. Meanwhile, the prevalence showed that a total of 168 respondents had severe suicidal ideation, and 2,340 (93.3%) had no or mild suicidal ideation (**Table 2**).

Demographics		n	Percentage (%)	
Conting	ents			
i)	Bukit Aman (HQ)	424	16.9	
ii)	Johor	197	7.9	
iii)	Kedah	105	4.2	
iv)	Kelantan	105	4.2	
v)	Kuala Lumpur	103	4.0	
vi)	Melaka	57	2.3	
vii)	Negeri Sembilan	149	5.9	
viii)	Pahang	170	6.8	
ix)	Perak	281	11.2	
x)	Perlis	60	2.4	
xi)	Pulau Pinang	376	15.0	
xii)	Sabah	205	8.2	
xiii)	Sarawak	96	3.8	
xiv)	Selangor	143	5.7	
xv)	Terengganu	37	1.5	
Gender				
i)	Male	1928	76.9	
ii)	Female	580	23.1	
Race				
i)	Malay	1984	79.1	
ii)	Indian	95	3.8	
iii)	Chinese	71	2.8	
iv)	Native of Sabah/Sarawak	358	14.3	
Religion	ı			
i)	Muslim	2194	87.5	
ii)	Hindu	90	3.6	
iii)	Buddhist	64	2.6	
iv)	Christian/other	160	6.3	

Table 1. Socio-demographics of respondents.

Demo	graphics	n	Percentage (%)
Age			
i)	18 – 30 years old	428	17.0
ii)	31 - 40 years old	1116	44.5
iii)	41-50 years old	666	26.6
iv)	50-60 years old	298	11.9
Rank			
i)	Senior Police Officer	885	35.3
ii)	Lower Rank Officer	1284	51.2
iii)	Corporal/Constable	339	13.5
position			
i)	General Policing	1098	43.8
ii)	Operation/Intelligence	716	28.5
iii)	Investigation/Prosecution	408	16.3
iv)	Others	286	11.4
Educa	tion		
i)	Master's & PhD	329	13.1
ii)	Bachelor's degree	574	22.9
iii)	Diploma	314	12.5
iv)	Matriculations/Foundations	228	9.1
v)	SPM	1063	42.4
House	hold Income (per month)		
i)	Less than RM4,850	1263	50.3
ii)	More than RM10,971	167	6.7
iii)	RM4,851 – RM10,970	1078	43.0
Marital	Status		
i)	Divorced/Separated	94	3.7
ii)	Married	2072	82.6
iii)	Single/unmarried	342	13.7

Table 1. (Continued).

Table 2. Prevalent rates of suicide ideation using KSI	Table 2	. Prevalent	rates of	fsuicide	ideation	using RSIS
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	Frequency	Percentage (%)
No / minimum risk of suicidal ideation	2340	93.3
Severe risk of suicidal ideation	168	6.7
Total	2508	100.0

3.2. Association of socio-demographic factors with suicidal ideation

The Pearson chi-square test was executed to compare the observed result with the expected result to determine if any socio-demographic factor influences suicidal ideation among the police in Malaysia (**Table 3**). Each of the socio-demographic factors was divided into two categorical data to observe the analyses. The Pearson chi-square analyses revealed that only age $\chi^{-2}(1, N = 2508) = 16.281$, p <0.001; marital status $\chi^{-2}(1, N = 2508) = 4.26$, p < 0.05; monthly family income $\chi^{-2}(1, N = 2508) = 9.60$, p <0.001; and respondent position $\chi^{-2}(1, N = 2508) = 4.17$, p = 0.041 were significantly associated with suicidal ideation. Thus, the

first hypothesis of this study was accepted, there is an association between socio-demographic factors and suicidal ideation among the police.

	Suicidal	χ ² , 1 <i>df</i>	р	Scores Cut-off	
Demographic	No (n= 2340)	Yes (n= 168)			
Gender			1.83, 1 <i>df</i>	0.176	0/1
Men	93.7% (1806)	6.3% (122)			
Women	92.1% (534)	7.9% (46)			
Age			16.28, 1 <i>df</i>	<0.001	0/1
18-40 years	91.7% (1416)	8.3% (128)			
41-60 years	95.9% (924)	4.1% (40)			
Race			0.33, 1 <i>df</i>	0.569	0/1
Malay	93.4% (1854)	6.6% (130)			
Non-Malays	92.7% (486)	7.3% (38)			
Religion			0.06, 1 <i>df</i>	0.803	0/1
Muslims	93.3% (2046)	6.7% (148)			
Non-Muslims	93.6% (294)	6.4% (20)			
Marital Status			4.26, 1 <i>df</i>	0.039	0/1
Single	91.1% (397)	8.9% (39)			
Married	93.8% (1943)	6.2% (129)			
Education Level			0.84, 1 <i>df</i>	0.359	0/1
Pre-degree/foundation	93.6% (1503)	6.4% (102)			
Post degree	92.7% (837)	7.3% (66)			
Monthly Income			9.60, 1 <i>df</i>	0.002	0/1
Salary < RM 4,850	91.8% (1159)	8.2% (104)			
Salary > RM 4,851	94.9% (1181)	5.1% (64)			
Rank			0.78, 1 <i>df</i>	0.377	0/1
Officers	93.9% (831)	6.1% (54)			
Rank & Files	93.0% (1509)	7.0% (114)			
Position			4.17, 1 <i>df</i>	0.041	0/1
General policing	94.2% (1304)	5.8% (80)			
Operational/ Investigation	92.2% (1036)	7.8% (88)			

Table 3. Chi-square analyses of suicidal ideation and socio-demographic factors.

3.3. Correlation between depression, emotional intelligence, hopelessness, and suicidal ideation

Spearman's correlation was conducted to evaluate the relationship between depression, emotional intelligence, hopelessness, and suicide ideation (**Table 4**). Emotional intelligence is found to significantly decrease depression, with a negative correlation $r_s = -0.425$, p < 0.001. Furthermore, as hopelessness increased, the severity of depression also significantly increased with a positive correlation, $r_s = 0.565$, p < 0.001. The output for hopelessness and emotional intelligence Spearman's test showed a significant negative

relationship, $r_s = -0.424$, p < 0.001. The opposite direction could be concluded as respondents with higher emotional intelligence tended to score less in hopelessness.

Meanwhile, a similar correlation test between hopelessness and suicide ideation showed a positive relationship between the two variables, $r_s = 0.447$, p < 0.001. The positive direction of the correlation coefficient suggests that higher scores for hopelessness also score high in suicide ideation. Similarly, as the depressive symptoms increase, the suicidal ideation also significantly increases, with a positive correlation, $r_s = 0.531$, p < 0.001. On the other hand, suicidal ideation and emotional intelligence are negatively significantly correlated $r_s = -0.286$, p < 0.001, which suggests, that higher emotional intelligence would decrease suicidal ideation. Therefore, the alternative hypothesis of this study was accepted, there is a relationship between the variables depression, emotional intelligence, and hopelessness, and suicidal ideation among the police. However, the values of the correlation of depression, emotional intelligence, hopelessness, and suicide ideation are weak or moderate^[62,63].

Table 4. Correlation between depression, emotional intelligence, hopelessness, and suicide ideation.

	Depression	Emotional Intelligence	Hopelessness	Suicidal Ideation
Depression	-	-0.425**	0.565**	0.531**
Emotional Intelligence		-	-0.424**	-0.286**
Hopelessness			-	0.447**
Suicidal Ideation				-

** Correlation is significant at the 0.01 level (2-tailed)

3.4. Risk factors of suicidal ideation

The binary logistic regression method was performed to determine the influence of depression, emotional intelligence, and hopelessness on suicide ideation (see **Table 5**). The logistic regression model was statistically significant $\chi^2(3, n = 2508) = 497.95$, p< 0.001, which means this model could differentiate between respondents with and without suicidal ideation. This model explains R²= 17.5% (Cox & Snell R Square) and R² = 45% (Nagelkerke R²) variance in suicide ideation with accurate classifications of 93.3% of cases. **Table 5** shows that depression and hopelessness contribute to the model significantly but not emotional intelligence. Depression was added to the model (OR = 54.558) as the largest risk factor, as well as hopelessness (OR = 7.412). This means that respondents with high depression had a 55 times chance of risk of suicidal ideation after other factors were controlled. Meanwhile, respondents with high hopelessness had seven times the chance of the risk of suicidal ideation in this model. However, emotional intelligence (OR = 0.832) did not add to the model. Based on these analyses, it could be said that depression, emotional intelligence, and hopelessness did predict suicidal ideation among police; therefore, the alternative hypothesis was accepted.

Table 5. Probability	of suicide ideation
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Variables	Odd ratio	Wald	df	Sig.
Constant	0.002	119.063	1	0.001
Depression	54.558	45.071	1	0.001
Emotional Intelligence	0.832	0.642	1	0.423
Hopelessness	7.412	91.054	1	0.001

3.5. Mediating effect of emotional intelligence and hopelessness

The mediation analysis using PROCESS Macro for Hayes^[64] was executed to answer the objective of the study to determine the mediating effect of emotional intelligence and hopelessness on suicidal ideation (**Table 5**). Step 1 of the mediation model, the regression of depression with suicidal ideation (total effect), while ignoring the mediator, was significant, $\beta = 0.238$, t = 29.554, p < 0.001. Meanwhile, the indirect impact of depression on suicidal ideation (c' path), was significant $\beta = 0.182$, t = 22.091, p < 0.001. Step 2 showed that the regression of depression with emotional intelligence on the mediator, suicidal ideation, was also significant, $\beta = -0.504$, t = -22.22, p < 0.001. Meanwhile, the regression of depression with hopelessness on the mediator, suicidal ideation was also significant, $\beta = 0.251$, t = 44.533, p < 0.001.

Step 3 of the mediation process showed that the mediator (emotional intelligence), controlling for depression, was significant, $\beta = 0.026$, t = 4.507, p < 0.001. Similarly, the mediation process of the mediator (hopelessness), in controlling depression, was also significant, $\beta = 0.102$, t = 4.825, p < 0.001.

This means that both the mediators affect suicidal ideation. Step 4 of the analyses revealed that when controlling the mediator (emotional intelligence), depression was a significant predictor of suicidal ideation β = -0.013, t (-0.013/0.004 =-3.25), t(-3.25<1.96). Furthermore, the analyses also showed that when controlling the mediator (hopelessness), depression was a significant predictor of suicidal ideation β = 0.026, t (0.026/0.007 = 3.71), t (3.71>1.96). The summary of the mediation of emotional intelligence and hopelessness in the relationship between depression and suicidal ideation is shown in **Table 6** and **Figure 1**.

The analyses also showed the value of the R-Square and F test. The value of R-Square 0.440 indicated that variable Y or the Outcome (Suicidal Ideation) can be explained by variable X (Depression), M1 (Emotional intelligence), and M2 (Hopelessness) as large 43.98%, F=392.791, p < 0.001, which indicated the partial effect in this model. From the above summary, emotional intelligence and hopelessness act as mediators in the relationship between depression and suicidal ideation among the police. Therefore, the alternative hypothesis is accepted.

Variables		β	SE	t	Sig.	95% Cl	
						Lower	Upper
Step 1	Depression \rightarrow SI (path c)	0.238	0.008	29.554	<0.001	0.223	0.254
	Depression \rightarrow SI (path c')	0.182	0.008	22.091	<0.001	0.166	0.198
Step 2	Depression \rightarrow EI (path a1)	-0.504	0.023	-22.220	<0.001	-0.549	-0.460
	Depression \rightarrow HP (path a2)	0.251	0.006	44.533	<0.001	0.240	0.262
Step 3	${\sf EI} o {\sf SI}$ (path b1)	0.026	0.006	4.507	<0.001	0.015	0.037
	HP $ ightarrow$ SI (path b2)	0.102	0.021	4.825	<0.001	0.61	0.143
Step 4	Depression \rightarrow EI \rightarrow SI	-0.013	0.004	-3.095		-0.021	-0.005
	Depression \rightarrow HP \rightarrow SI	0.026	0.007	3.760		0.012	0.039

Table 6. Emotional intelligence and hopelessness as mediators in the relationship between depression and suicidal ideation .

SI= suicidal ideation, EI= emotional intelligence, HP= hopelessness



Figure 1. Mediation model of emotional intelligence and hopelessness.

4. Discussion

The prevalence of suicidal ideation among the police in Malaysia at 6.7% is still considered to be normal compared to the norm for Malaysia. The research of Chan et al.^[65] among adolescents in Malaysia revealed the prevalence of suicidal ideation at 6.2%. Meanwhile, in an earlier study among adolescents, Ahmad et al.^[66] suggested that suicidal ideation was 7.9%. The suicide rate in Malaysia from 2009 to 2019 was five deaths per 100,000, which is quite high compared to neighbouring countries like Brunei and Indonesia with a ratio score of two deaths per 100,000 people except for Singapore and Thailand with 9 and 8 deaths per 100,000 respectively^[1]. This norm among police in Malaysia even though considered low, is alarming as the actual suicide rate may be even higher than reported due to stigma, misclassification, and limited surveillance systems.

It is of great concern that 168 out of 2,508 police reported high or severe suicidal ideation, which constitutes almost 7% of the total respondents in this research. These numbers could be due to the demographic profiles of the respondents themselves in this research. Most respondents were aged 31-50 years old (71%), which constitutes the most productive age of a person. This is the age when individuals are trying hard to earn money to raise their expanding family, maintain a household, contribute to children's education, maintain career paths, lifestyle commitments, and health issues, as well as economic and social expectations. Therefore, they are prone to mental diseases like depression due to increasingly difficult work and social obligations^[67]. Further study of suicide rates among the Malaysian elderly between 1995 and 2020 indicated that there is an alarming high incidence of suicide among Malaysia's elderly^[68].

In this study, some of the socio-demographic variables are significant predictors of suicide ideation and some are not. Profiling a person with suicidality is often challenging as there is no assurance that certain characteristic fits those persons with suicidality or having suicidal ideation. The wide possibilities and the nature of suicide itself which is usually impulsive, seem to contribute to the inconsistent findings in suicidal research. In this study, based on the prevalence of suicidal ideation, women, aged between 31 and 40 years old, Chinese and Christian/ other religion, single, lower income family, in the position of investigation/ prosecution, and working at the Commercial Crime Investigation Department (CCID) were at risk of having suicidal ideation. Meanwhile, the Pearson chi-square analyses revealed that only age, marital status, monthly family income, and respondent position were significantly associated with suicidal ideation.

This study corroborates Ahmad et al.^[66], Khan et al.^[69], and Chan et al.^[65] who reported that females are associated with high suicidal ideation. In contrast, Chan et al.^[65] further reported that female Indian adolescents were more likely to report suicidal ideation in the multivariate regression analysis of their study. On the other hand, Khan et al.^[69], found that Chinese females constituted the majority reporting suicidal thoughts. Both Indian and Chinese females were at high risk of suicidal ideation in the study of Ahmad et al.^[66]. Meanwhile, older women were less likely to have suicidal ideation than younger women^[70]. Cheah et al.^[71] suggested that women have a higher tendency to engage in suicidal behaviour than men because of the double burdens or roles that they hold as it imposes more stress due to balancing work and household commitments. This is very true as the work of the police is acknowledged to be one of the most stressful jobs not only in Malaysia but globally^[72]. Women are required to multi-task and sustain masculinity during most of their long working hours besides being overwhelmed with the cultural and traditional requirement of maintaining household roles.

Socio-economic status is one of the risk factors for suicide ideation and attempts^[73]. This research showed that the income of 50.3% of the police was less than Malaysian Ringgit (MYR) 4,850; 64.7% were lower rank police officers and 64% had a Diploma or basic certificate of Malaysian education. The monthly household income of less than Malaysian Ringgit (MYR) 4,850 is the bottom category of Malaysian households, and reflects the overall financial well-being known as B40^[74]. Having a low monthly income and a family to take care of with the considerably high living costs nowadays represents a challenge even for police officers. Furthermore, in Malaysian culture, extended family living together is still practiced, leading to higher house rentals, and extra spending on gas, and vehicles, especially in urban states, thereby adding to the factors that may impact police officers' suicidal ideation if they are depressed.

Moreover, in the police force, particularly in Malaysia, having a certain educational background does not determine the rank or department in which they serve. Although police in Malaysia join the force depending on their educational background and qualifications, once in the force, promotion or career opportunity is not solely based on education. Only a small percentage of the factors governing promotion is based on the educational background. Despite this, job performance and other career advancement act as the requirement for competency and advance learning for promotion. In this study, the researchers found that lower police personnel had first degrees and were diploma holders but not in the commanding post and vice versa. Moreover, there were officers in the commanding post with very basic educational backgrounds. These situations would possibly create stress, depression, and difficulties if not addressed satisfactorily. The lack of education also influences the command and control as well as the leadership style in the organisation. To exacerbate the situation, the crime rate is high for those police working in the urban states. Such factors contribute to the feeling of hopelessness and suicidal ideation. However, the researchers found, that high emotional intelligence, the ability to regulate one's own emotions, and the ability to understand one's own emotions might counter the impulsivity of hopelessness or suicidal ideation.

Moreover, the higher level of education among almost the majority of the lower ranking police in this study might also explain how they cope with their socio-economic disadvantages. This is only a simple research to determine the influence, and further research on other variables, like previous records of mental health status and the nature of duty, should be undertaken for a more accurate prediction. In terms of religion and race, most of the respondents are Muslims (87.5%) and Malay (79.1%). Islam prohibits the act of suicide and suicide ideation with suicide being considered a grave sin in Islam^[65]. Muslims are bound to this, and the Malay people take this very seriously in terms of the stigma and cultural and religious prohibition. Therefore, the researchers believe that the majority of the respondents in this research are also aware of this.

Meanwhile, working in investigation units (investigating officers) is generally considered to be the most stressful post in the RMP. This is because the police officers have to face the organisation's needs, and issues every day as well as deal with the public (complainants, suspects, and their families), other related agencies (for example, court judges and prosecutors, and forensics), and other elements in the investigation. The CCID also experiences the highest prevalence of suicide and suicide ideation compared to others, as although this department could be considered among the 'younger' departments established in RMP, it is rapidly facing challenging cases in this millennium with scammers proactively contributing to the increasing cases. One factor that should be remembered is that this department is among the smallest in the RMP, and the available positions are still limited and under revision for upgrade.

In terms of relationships, the current study found that emotional intelligence is negatively correlated with suicidal ideation. This suggests that emotional intelligence can act as a protective factor against suicide ideation. The result suggests that higher emotional intelligence, which includes high self-emotion appraisal, regulation of emotions, and use of emotions, helps protect individuals from suicide ideation. They can control, regulate, and balance their emotions appropriately and function well through their life stages even though they are facing challenges or difficulties in their life and work. Although the struggle, stress, and other factors that contribute to suicidal ideation are there, they manage to balance their feelings and emotions^{[75,76].}

The Integrated Motivational-Volitional Model of Suicidal Ideation Behaviour framework helps predict the factors that lead people to think about suicide and the factors that govern whether people act on their thoughts (suicide attempt)^[66]. It explains the suicidal process consistent with the ideation-to-action framework. O'Connor and Kirtley elaborate on this theory and recognise that individual vulnerability confers an elevated risk for developing suicidal ideation when the stressors present^[77]. The vulnerabilities might include personality characteristics, socioeconomic deprivation, or social environmental factors.

Therefore, in this research, low monthly income or other demographic variables and hopelessness might be the vulnerabilities or risk factors that can affect individual suicidal ideation. However, the individual experiences of stress, negative mood, or feeling of hopelessness were not triggered into 'cognitive reactivity" or bias towards negative information until the emergence of suicidal ideations as the motivational moderators interfere along the way. According to this theory, Motivational moderators or protective factors like positive future thinking, adaptive goal pursuit, and reasons for living allow the trapped individual to see alternatives, be more positive, and experience less pain. Thus, in line with the theory, this explains why people with higher emotional intelligence can see life in a more positive way. Police officers with high emotional intelligence would be able to prevent cognitive reactivity or bias towards negative information that nurtures the feeling of being trapped, lost, and suicidal.

In addition, the findings suggest that hopelessness is the predictor of suicide ideation due to the positive correlation of hopelessness and suicide ideation. Again, hopelessness is among the vulnerability factors or characteristics that individuals have according to the Integrated Motivational-Volitional Model of Suicidal Ideation Behaviour framework. Meanwhile, according to the Three Steps Theory of Suicide by Klonsky et al.^[78] four factors contribute to suicide-pain, hopelessness, connection, and suicide capability. This theory suggests that greater pain and hopelessness influence an individual to have suicidal ideation and that the level of pain compared to connectedness would determine the level of suicidal ideation. When the pain is greater than the individual connectedness it is conducive to strong ideation. Finally, capability is the factor that determines whether the individual experiences ideation or ends up attempting suicide. Corroborating this theory framework, this study found, that police with high hopelessness tend to fall into the category of high

suicidal ideation as hopelessness and the feeling of pain trigger ideation. However, according to Joiner^[4] in "The Interpersonal-Psychological Theory of Suicidal Behaviour", individuals will not act on the desire for death.

This study has some limitations. Being a cross-sectional research design, it is not possible to establish causal relationships, nevertheless, the findings from this descriptive research provide valuable insights and inform future research concerning the understanding of the protective and risk factors for suicidal ideation. Emotional intelligence and hopelessness are both assumed to be predictors of suicidal ideation. However, which factors precede the development of suicidality needs further research. Throughout this study, the researchers came to realise that other factors may contribute to protective factors, such as masculinity, which could lead to the discovery of new findings. Moreover, these current findings are limited to the police in Malaysia, and therefore, the results should not be generalised to other populations. Other than that, the data were obtained primarily from self-report measures, which might lead to biased results and underestimation of responses to sensitive questions on hopelessness and suicidal ideation. Despite the prior briefing of the confidentiality and secrecy of the research findings, the researchers could not prevent the possibility that the respondents answered the questionnaires carefully and mindfully to favour the best answer to minimise the possible implications.

As for future research, it would be beneficial to include several risk factors and protective factors to assess the aetiology of suicide ideation among the police in Malaysia. Other variables like period of service, nature of duty, medical or health records, and other variables should be considered for a deeper understanding of the issues of suicidality among police. Moreover, understanding previous theoretical frameworks concerning the contribution of social and psychological factors to suicide ideation in the context of Malaysia would help provide knowledge concerning the specific cultural context of suicide ideation in Malaysia. Among the practical implications of this research is that early identification of depression and hopelessness among police through a screening model could be implemented, meaning that, police with a need for psychological help would be catered for. Furthermore, holistic monitoring and support systems could also be proactively determined. Moreover, focusing on the emotional intelligence module as a coping mechanism together with social skills would be impactful to cope with suicidal ideation among police officers in Malaysia.

5. Conclusion

The findings provide some insights into how emotional intelligence can contribute to saving lives and that hopelessness is the risk factor that should be taken into consideration. The findings from current studies and the comparison with previous studies also widen the possibility for further explorations of the protective and risk factors for suicidal ideation. Inconsistent findings with previous research or similarities provide a brief connotation that suicidality or suicide ideation is always revolutionised through the complexity of human beings in this complicated world. From this study, the researchers found that focusing on the strategy to build on emotional intelligence among the police is valuable as a preventive measure against suicidal ideation. Emotional intelligence can be learned. Despite the weak relationship, to some extent, emotional intelligence has been proven to act as a significant protective factor of suicidal ideation among the police in Malaysia. Therefore, more training and skills development are needed for suicide intervention directed at enhancing emotional intelligence. At the same time, therapists and counsellors were well-trained in the related areas and were available to help those experiencing emotional breakdowns, feelings of hopelessness, or the need for help without any stigma.

Author contributions

Conceptualisation, N.A. and N.B.; methodology, N.B.; software, N.A. and N.B.; validation, N.A., N.B., and R.H.; formal analysis, N.A. and N.B.; investigation, N.A.; resources, N.A.; data curation, N.A., N.B., and R.H.; writing original draft preparation, N.A.; writing review and editing, N.B., R.H., and H.A.; visualisation, N.A.; supervision, N.B., R.H. & H.A.; project administration, N.A.; funding acquisition, N.B. All authors have read and agreed to the published version of the manuscript.

Conflict of interest

The authors declare no conflict of interest.

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