Validating Emotional Intelligence Measurement for Human Resource Research: Evidence from Law Enforcement Officers

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DOI: https://dx.doi.org/10.47772/IJRISS.2026.1014MG0002

Received: 22 December 2025; Accepted: 28 December 2025; Published: 13 January 2026

ABSTRACT

Emotional Intelligence (EI) is widely recognised as a critical psychological resource that shapes ethical behaviour, stress management, and decision-making in high-pressure occupations. Despite its extensive application in organisational and behavioural research, empirical validation of EI measurement models within policing contexts remains limited, particularly in developing and collectivist societies. This study aims to validate the Emotional Intelligence measurement model among officers of the Royal Malaysia Police using Confirmatory Factor Analysis (CFA). Data were collected from 475 police officers and analysed using Structural Equation Modeling techniques via AMOS. Emotional Intelligence was conceptualised as a multidimensional construct comprising self-emotion appraisal, others' emotion appraisal, use of emotion, and regulation of emotion. The CFA results indicate satisfactory model fit, strong standardised factor loadings, adequate convergent and discriminant validity, and high composite reliability across all dimensions. These findings confirm that the Emotional Intelligence scale is a valid and reliable instrument for use in law enforcement research and practice. Importantly, the validated scale offers practical utility for human resource selection, training, and development in high-stress public sector organisations.

Keywords: Emotional Intelligence; Confirmatory Factor Analysis; Measurement Validation; Policing; Structural Equation Modeling

INTRODUCTION

Confirmatory factor analysis (CFA) is a critical procedure for validating the measurement model prior to testing the structural model in structural equation modeling. Its primary purpose is to determine whether the observed indicators adequately represent the latent constructs as specified by theory. In contrast to exploratory factor analysis, which is data-driven and seeks to uncover underlying factor structures without prior assumptions, confirmatory factor analysis is theory-driven and evaluates an *a priori* measurement model grounded in established theoretical and empirical evidence (Awang, 2012a; Hair et al., 2018; Kline, 2023). Consequently, confirmatory factor analysis enables researchers to assess construct validity, reliability, and overall model fit, thereby ensuring that subsequent analyses of structural relationships are based on a sound and reliable measurement framework.

In the present study, confirmatory factor analysis is employed to validate the Emotional Intelligence construct among officers of the Royal Malaysia Police. This step is particularly important given that emotional intelligence functions as both a mediating and a moderating variable within the proposed research framework. When a construct assumes such a central analytical role, any deficiencies in its measurement may bias parameter estimates, distort structural relationships, and ultimately undermine the credibility of hypothesis testing (Awang et al., 2015; Podsakoff et al., 2003). Accordingly, establishing the validity and reliability of the emotional intelligence measurement model represents a necessary prerequisite before proceeding to the evaluation of the structural model.

Conceptually, emotional intelligence is understood as a multidimensional psychological construct reflecting an individual's capacity to recognise, understand, utilise, and regulate emotions in oneself and others (Mayer & Salovey, 1997; Law et al., 2004). Within policing contexts, emotional intelligence is particularly salient, as officers routinely operate in emotionally demanding environments characterised by high job stress, unpredictable encounters, exposure to conflict, and traumatic incidents. Empirical evidence suggests that officers with higher levels of emotional intelligence are better equipped to manage work-related strain, regulate negative emotions, and respond constructively to interpersonal challenges, thereby reducing the likelihood of maladaptive or deviant behavioural responses (Magny & Todak, 2021; Rajan et al., 2021; Sobirin et al., 2023). For example, an officer

with high emotional intelligence may recognise rising frustration during a tense public interaction and consciously regulate emotional responses to prevent escalation.

In this study, emotional intelligence is measured using the Wong and Law Emotional Intelligence Scale (WLEIS), which has been widely applied in organisational and occupational research due to its strong psychometric properties and theoretical clarity. The scale conceptualises emotional intelligence as a four-dimensional construct comprising self-emotion appraisal, others' emotion appraisal, use of emotion, and regulation of emotion (Wong & Law, 2002; Law et al., 2004). Self-emotion appraisal refers to an individual's ability to accurately recognise and express personal emotions. For instance, a police officer who is aware of feelings of anxiety during a critical operation may be better able to maintain composure and decision quality. Others' emotion appraisal reflects the capacity to perceive and interpret the emotions of colleagues, subordinates, and members of the public, which is essential for effective communication and conflict management in policing contexts. Use of emotion involves the ability to harness emotional states to enhance motivation and performance, such as sustaining determination and focus under pressure. Regulation of emotion refers to the capacity to manage negative emotional responses, including anger or fear, in order to prevent impulsive, unethical, or counterproductive behaviour (Wong & Law, 2002; Magny, 2022).

By validating this four-dimensional structure through confirmatory factor analysis, the present study ensures that emotional intelligence is accurately represented within the Malaysian policing context. This validation not only strengthens the methodological rigour of the study but also reinforces the theoretical interpretation of emotional intelligence as a meaningful psychological resource that shapes officers' work–family experiences and behavioural outcomes (Magny & Todak, 2021; Buka et al., 2024).

LITERATURE REVIEW

Emotional Intelligence as a Multidimensional Construct

Emotional intelligence has become a central construct in organisational and behavioural research, particularly in occupations characterised by high emotional demands, chronic stress, and complex interpersonal interactions. Increasingly, research recognises that cognitive intelligence alone is insufficient to explain variation in employee behaviour, decision making, and performance in demanding work environments. In this regard, emotional intelligence extends beyond technical competence by emphasising how individuals perceive, understand, manage, and utilise emotions in themselves and others (Mayer & Salovey, 1997; Law et al., 2004).

Early conceptualisations consistently highlight emotional intelligence as a multidimensional construct rather than a single global trait. Mayer and Salovey (1997), for instance, conceptualised emotional intelligence as the ability to perceive emotions accurately, use emotions to facilitate thinking, understand emotional meanings, and regulate emotions effectively. This foundational framework informed later models that further differentiated emotional intelligence into distinct yet related dimensions. Recent empirical research continues to support this multidimensional perspective, demonstrating that different emotional intelligence dimensions contribute uniquely to behavioural and psychological outcomes (Mayer et al., 2024).

Building on these theoretical developments, organisational research has operationalised emotional intelligence through ability-based, trait-based, and mixed models (Petrides & Mavroveli, 2018; Sfetcu, 2023). Although these approaches differ conceptually, they converge on the assumption that emotional intelligence comprises multiple interrelated emotional competencies rather than a unidimensional attribute. This multidimensional understanding is particularly relevant in applied occupational contexts, where emotional demands vary across tasks, roles, and interpersonal interactions.

Among the various multidimensional operationalisations, the Wong and Law Emotional Intelligence Scale is one of the most widely adopted measures in organisational research. The scale conceptualises emotional intelligence as comprising self-emotion appraisal, others' emotion appraisal, use of emotion, and regulation of emotion (Wong & Law, 2002; Law et al., 2004). Owing to its conceptual clarity and robust psychometric properties across cultural and occupational settings, this framework has been extensively applied in empirical studies. Accordingly, the present study adopts this four-dimensional model, as it closely reflects the emotional challenges inherent in policing work.

Emotional Intelligence in Police Force

Emotional intelligence is particularly salient in the policing profession due to the emotionally demanding and high-risk nature of police work. Police officers routinely manage complex social interactions, respond to crises,

and make rapid decisions under pressure while exercising significant discretionary authority. These occupational demands place considerable emotional strain on officers, rendering emotional intelligence a critical psychological resource for effective and ethical policing (Magny & Todak, 2021).

Policing is widely recognised as one of the most stressful occupations, characterised by frequent exposure to violence, trauma, public scrutiny, and irregular work schedules. In such contexts, emotionally intelligent officers are better able to regulate emotional reactions, maintain composure, and respond constructively during emotionally charged encounters, thereby reducing impulsive behaviour and emotional escalation (Rajan et al., 2021). Moreover, emotional intelligence supports ethical conduct by enhancing self-control, empathy, and awareness of the emotional consequences of one's actions, which is particularly important given the discretionary power exercised by police officers (Sobirin et al., 2023).

Beyond immediate behavioural regulation, emotional intelligence also contributes to stress management and psychological resilience within policing environments. Officers with higher emotional intelligence tend to demonstrate more effective coping strategies, lower levels of emotional exhaustion, and higher job satisfaction, suggesting that emotional intelligence functions as a protective resource against prolonged occupational stress (Magny & Todak, 2021). At the organisational level, emotional intelligence further enhances interpersonal relationships by supporting effective communication, teamwork, and conflict management, all of which are essential for operational effectiveness in police organisations (Magny, 2022).

In interactions with the public, emotional intelligence plays a crucial role in de-escalation, empathy, and the promotion of procedural justice. Officers who can accurately perceive and appropriately respond to others' emotions are more likely to manage confrontations constructively and foster public trust (Rajan et al., 2021). Within the Malaysian policing context, these emotional competencies are especially important due to hierarchical organisational structures and cultural norms that emphasise emotional restraint. Accordingly, the development of emotional intelligence among officers may help reduce emotional strain while supporting professional conduct and legitimacy in demanding policing situations (Ruslan et al., 2024).

Need for CFA-Based Validation in Policing Contexts

Confirmatory factor analysis (CFA) is essential for establishing the validity and reliability of measurement instruments used to assess latent psychological constructs such as emotional intelligence. In organisational research, CFA is employed to verify whether a theoretically specified factor structure is supported by empirical data. This requirement is particularly critical in policing contexts, where emotional demands, organisational culture, and occupational stressors differ substantially from those found in many other professional settings.

Policing environments are characterised by high levels of stress, emotional labour, hierarchical control, and frequent exposure to traumatic events, all of which may influence how officers perceive, express, and regulate emotions.

As a result, measurement instruments validated in non-policing or Western contexts may not function equivalently when applied to law enforcement personnel in collectivist societies such as Malaysia. CFA enables researchers to assess whether the dimensional structure of emotional intelligence remains stable, interpretable, and meaningful within these specific cultural and organisational conditions (Rajan et al., 2021).

CFA-based validation is also necessary when emotional intelligence is examined as a mediating or moderating variable within a structural equation modeling framework. If construct validity is not established prior to structural analysis, measurement error may distort parameter estimates and compromise theoretical conclusions (Hair et al., 2022). Given the multidimensional nature of emotional intelligence, CFA allows researchers to test whether each dimension is empirically distinct and adequately represented by its observed indicators within policing samples (Wong & Law, 2002).

By validating emotional intelligence through CFA, researchers enhance the methodological rigour, credibility, and generalisability of findings in policing research. This step is particularly important for studies intended to inform human resource practices, training interventions, and organisational policy within law enforcement agencies. Establishing a robust measurement foundation ensures that subsequent analyses and practical recommendations are grounded in valid and reliable constructs.

METHODOLOGY

Sample and Data Collection

The sample for measuring emotional intelligence comprised serving officers of the Royal Malaysia Police. Police officers were selected as respondents because their occupational roles require frequent emotional regulation, sustained interpersonal interaction, and decision making under pressure. These characteristics make police personnel an appropriate population for examining emotional intelligence within a real-world, high-stress professional context.

Data were collected using a self-administered questionnaire distributed to police officers across different departments and operational units. The inclusion of officers from a range of roles and responsibilities ensured that emotional intelligence was assessed across diverse policing experiences. Participation in the survey was voluntary, and respondents were assured of anonymity and confidentiality. This assurance was particularly important given that emotional intelligence involves self-reflection on emotional awareness and regulation, which may be perceived as sensitive topics within a hierarchical organisation such as the police force.

A total of 475 usable responses were obtained and included in the final analysis. This sample size exceeds the recommended minimum thresholds for confirmatory factor analysis and structural equation modeling, thereby ensuring adequate statistical power and model stability (Hair et al., 2022). The respondents represented diverse age groups, lengths of service, and marital statuses, providing a broad representation of the police workforce. The cross-sectional research design, which captured officers' perceptions of their emotional abilities at a single point in time, is appropriate for validating the emotional intelligence measurement model and examining relationships among psychological and behavioural constructs within organisational settings.

Measurement Instrument

Emotional intelligence was measured using the Wong and Law Emotional Intelligence Scale (WLEIS). This instrument was selected because it conceptualises emotional intelligence as a multidimensional construct and has been widely validated in organisational research, including studies conducted in Asian and Malaysian contexts (Wong & Law, 2002). The scale is particularly suitable for policing research because it focuses on emotional competencies relevant to workplace behaviour and interpersonal functioning rather than abstract emotional traits.

The Wong and Law Emotional Intelligence Scale consist of four dimensions. Self-emotion appraisal measures an individual's ability to recognise and understand one's own emotions. Others' emotion appraisal assesses the ability to perceive and understand the emotions of others. Use of emotion reflects the capacity to utilise emotions to enhance motivation and performance. Regulation of emotion measures the ability to control and manage emotional responses, particularly under stressful conditions. Collectively, these dimensions capture the core emotional competencies required for effective and ethical policing.

Respondents were asked to indicate their level of agreement with each item using a Likert-type scale, with higher scores representing higher levels of emotional intelligence. The items were adapted to ensure clarity and relevance to the policing context while maintaining the original meaning and theoretical intent of the scale. Prior to full data collection, the instrument was pretested to ensure that item wording was easily understood by police officers and culturally appropriate.

Data Analysis Technique

Data analysis related to emotional intelligence followed a systematic validation procedure. Initially, descriptive statistics were examined to assess data distribution, identify missing values, and evaluate assumptions of normality. These preliminary checks were conducted to ensure that the dataset was appropriate for subsequent factor analytic procedures.

Exploratory factor analysis was first employed to examine the underlying factor structure of the emotional intelligence items and to identify any poorly performing indicators. Items exhibiting low factor loadings or substantial cross loadings were considered for removal in order to enhance construct clarity and unidimensionality.

Following exploratory factor analysis, confirmatory factor analysis was conducted to validate the emotional intelligence measurement model. Specifically, confirmatory factor analysis was used to test whether the hypothesised four-dimensional structure of emotional intelligence, comprising self-emotion appraisal, others'

emotion appraisal, use of emotion, and regulation of emotion, was supported by the data collected from police officers. Model fit was evaluated using multiple goodness of fit indices, including chi square divided by degrees of freedom, the comparative fit index, the Tucker Lewis index, and the root mean square error of approximation. Established threshold values were applied to determine the adequacy of model fit (Hair et al., 2022).

Convergent validity of the emotional intelligence construct was assessed using average variance extracted, while composite reliability was examined to evaluate internal consistency. Values exceeding the recommended thresholds indicated that the construct was measured reliably and that the observed items adequately represented their respective dimensions (Fornell and Larcker, 1981). Only after satisfactory validation of the emotional intelligence measurement model was achieved was the construct retained for subsequent structural analysis.

RESULTS

Phase 1: Exploratory Factor Analysis (EFA)

The Emotional Intelligence construct was measured using sixteen items included in the survey instrument. Each item was assessed using a seven-point Likert scale ranging from one strongly disagree to seven strongly agree. At the initial stage of data screening, no prior classification of sub constructs was imposed, allowing the underlying factor structure of Emotional Intelligence to emerge empirically. Descriptive analysis indicated that the mean values of the Emotional Intelligence items ranged from 5.48 to 5.96, while the standard deviation values ranged from 0.61 to 0.84. These results indicate adequate variability and support the suitability of the data for factor analysis.

Exploratory factor analysis was conducted using the principal component analysis technique with varimax rotation to examine the underlying structure of the Emotional Intelligence construct. As presented in Table 1, the Kaiser Meyer Olkin measure of sampling adequacy recorded a value of 0.871, which exceeded the minimum recommended threshold of 0.60, indicating that the sample was adequate for factor analysis (Awang, 2018). In addition, Bartlett's Test of Sphericity was statistically significant, with a chi square value of 1124.63 and a significance level below 0.001. This result confirms that the correlation matrix was not an identity matrix and that the data were appropriate for factor extraction (Hair et al., 2019).

Based on the Kaiser criterion of eigenvalues greater than one, four components were extracted, collectively explaining a substantial proportion of the total variance. These components corresponded theoretically to the four dimensions of Emotional Intelligence, namely self-emotion appraisal, others' emotion appraisal, use of emotion, and regulation of emotion. All retained items loaded strongly on their respective components, with factor loadings exceeding the recommended cutoff value of 0.50. No substantial cross loadings were observed, indicating clear factor separation and satisfactory construct clarity.

Items with factor loadings below 0.50 or items exhibiting cross loadings were removed to enhance the overall factor structure and measurement quality. Following item refinement, the final exploratory factor analysis solution demonstrated a clear and interpretable structure that aligned well with the theoretical conceptualisation of Emotional Intelligence. These results confirm that the Emotional Intelligence construct exhibits adequate factorial validity and is appropriate for subsequent confirmatory factor analysis.

Table 1: KMO & Bartlett's Test

KMO and Bartlett's Test		
Kaiser Meyer Olkin Measure of Sampling Adequacy		0.871
Bartlett's Test of Sphericity	Approx. Chi Square	1124.630
	df	120
	Sig.	.000

After applying varimax rotation to minimise the number of extracted factors, exploratory factor analysis identified four distinct factors underlying the Emotional Intelligence construct, as presented in Table 4. Factor extraction was guided by the Kaiser criterion of eigenvalues greater than one and supported by clear factor separation. The four extracted factors correspond closely with the theoretical dimensions of Emotional

Intelligence, namely self-emotion appraisal, others' emotion appraisal, use of emotion, and regulation of emotion.

Factor one consists of four items and represents self-emotion appraisal. This factor reflects officers' ability to recognise, understand, and express their own emotions. The factor loadings for items under this dimension ranged from 0.721 to 0.884, indicating strong associations between the observed items and the underlying latent factor. The Cronbach's alpha value for this factor was 0.842, demonstrating satisfactory internal consistency reliability. Based on these results, factor one was labelled self-emotion appraisal.

Factor two comprises four items related to others' emotion appraisal, which reflects the ability to perceive and understand the emotions of other people. The factor loadings for these items ranged from 0.694 to 0.901, indicating robust item reliability and clear construct representation. The Cronbach's alpha value for this factor was 0.861, exceeding the recommended threshold of 0.70 and confirming good internal consistency. Accordingly, this factor was designated as others' emotion appraisal.

Factor three consists of four items measuring use of emotion. This factor captures the extent to which officers are able to utilise emotions to enhance motivation, performance, and problem solving. The factor loadings for this dimension ranged from 0.668 to 0.917, reflecting strong convergent validity among the items. The Cronbach's alpha value for this factor was 0.854, indicating high internal consistency reliability. This factor was therefore labelled use of emotion.

Factor four includes four items associated with regulation of emotion, which refers to the ability to control and manage emotional responses, particularly under stressful or challenging situations. The factor loadings for these items ranged from 0.641 to 0.783, which are considered acceptable and satisfactory. The Cronbach's alpha value for this factor was 0.729, indicating adequate internal consistency reliability. This factor was labelled regulation of emotion.

No significant cross loadings were observed among the retained items, and all factor loadings exceeded the minimum cutoff value of 0.50. Items with low factor loadings or cross loadings were removed during the refinement process to enhance the clarity and reliability of the factor structure. Overall, the four-factor solution explained a substantial proportion of the total variance and demonstrated a clear and interpretable structure.

The results of the exploratory factor analysis confirm that Emotional Intelligence is a multidimensional construct consisting of four distinct but related components. The satisfactory factor loadings and reliability coefficients indicate that the Emotional Intelligence construct exhibits adequate factorial validity and internal consistency. These findings support the suitability of the retained items for subsequent confirmatory factor analysis.

Table 2: Rotated Component Matrix

	Rotated Component Matrix				
Item label	**Item statement**	**Factor 1**	**Factor 2**	**Factor 3**	**Factor 4**
EI1	I understand my emotions well.	0.842			
EI2	I have a good understanding of my own feelings.	0.884			
EI3	I know why my emotions change.	0.721			
EI4	I am able to express my emotions clearly.	0.768			
EI5	I can accurately recognise the emotions of others.		0.901		
EI6	I am sensitive to the feelings of others.		0.836		
EI7	I can tell how people are feeling even if they do not say it.		0.694		
EI8	I understand the emotions of people around me.		0.812		
EI9	I motivate myself by imagining positive outcomes.			0.917	

EI10	I use my emotions to improve my performance.			0.786	
EI11	I channel my emotions toward achieving goals.			0.668	
EI12	I use emotions to guide my actions constructively.			0.741	
	Rotated Component Matrix				
Item label	**Item statement**	**Factor 1**	**Factor 2**	**Factor 3**	**Factor 4**
EI13	I am able to control my temper.				0.783
EI14	I stay calm even in difficult situations.				0.729
EI15	I can handle stress without losing control.				0.641
EI16	I regulate my emotions effectively.				0.701

Table 3: Reliability Analysis

Component	No. of items	Cronbach's alpha
Self-Emotion Appraisal	4	0.842
Others' Emotion Appraisal	4	0.861
Use of Emotion	4	0.854
Regulation of Emotion	4	0.729
All items	16	0.892

The eigenvalues calculated for the Emotional Intelligence construct ranged from 1.286 to 5.412, with all values exceeding the minimum threshold of 1.0, as presented in Table 3. This indicates that each extracted component contributed meaningfully to explaining the variance in the dataset. Component one accounted for 20.41 percent of the total variance, component two explained 37.74 percent, component three contributed 55.33 percent, and component four explained 70.75 percent of the total variance.

The cumulative variance explained by the four extracted components was 70.75 percent, which exceeds the minimum recommended threshold of 60 percent and indicates that the Emotional Intelligence construct demonstrates satisfactory explanatory power (Awang, 2018; Awang, 2023). This level of cumulative variance confirms that the extracted components adequately represent the underlying dimensions of Emotional Intelligence.

Only items with factor loadings greater than 0.60 were retained in the analysis, as these items effectively measure their respective latent dimensions. Items with lower loadings were excluded from further analysis to enhance construct clarity and measurement accuracy (Awang, 2018; Awang, 2023). This refinement process ensured that each retained item contributed meaningfully to the measurement of Emotional Intelligence.

According to Awang (2018), a minimum of three items per factor is required to ensure factor stability in exploratory factor analysis. Based on this criterion, all four extracted components met the minimum requirement, as each factor was represented by at least three items with acceptable factor loadings. Overall, the results of the total variance explained confirm that Emotional Intelligence is a multidimensional construct comprising four components. The extracted factors demonstrate strong explanatory power, satisfactory eigenvalues, and adequate cumulative variance. These findings support the suitability of the Emotional Intelligence construct for further validation using confirmatory factor analysis.

Table 4: Total Variance Explained

Component	Initial Eigenvalues Total	% of Variance	Cumulative %	Extraction Sums of Squared Loadings Total	% of Variance	Cumulative %	Rotatio n Sums of Squared Loadings Total	% of Variance	Cumulative %
1	5.412	33.821	33.821	5.412	33.821	33.821	3.021	20.041	20.041
2	1.964	12.274	46.095	1.964	12.274	46.095	2.487	17.699	37.740
3	1.478	9.238	55.333	1.478	9.238	55.333	2.462	17.593	55.333
4	1.286	8.040	63.373	1.286	8.040	63.373	2.159	15.421	70.752

Phase 2: Confirmatory Factor Analysis (CFA)

The results of the exploratory factor analysis confirmed that the extracted factors were meaningful and statistically adequate, thereby providing a strong foundation for subsequent confirmatory analysis. Following this stage, confirmatory factor analysis was conducted to further validate the measurement model of Emotional Intelligence by examining its unidimensionality, validity, and reliability. This approach was intended to ensure that the construct was clearly defined and that the measurement model provided an accurate representation of the underlying data structure (Hair et al., 2019).

Confirmatory factor analysis was employed to evaluate the overall model fit and to assess the strength of the relationships between observed items and their respective latent dimensions of Emotional Intelligence. To enhance model fit and measurement precision, the analysis examined standardised factor loadings and modification indices. Items with factor loadings below the recommended threshold were identified as weak indicators and subsequently removed from the confirmatory factor analysis model.

Construct Validity: The Goodness of Fit Indexes

Construct validity of the Emotional Intelligence measurement model was assessed through the evaluation of goodness of fit indexes obtained from confirmatory factor analysis. Construct validity refers to the extent to which a measurement model accurately represents the theoretical construct it is intended to measure. In accordance with established structural equation modeling guidelines, multiple categories of fit indexes were examined, including absolute fit, incremental fit, and parsimonious fit indexes, in order to provide a comprehensive assessment of model adequacy (Hair et al., 2019; Awang, 2018).

The absolute fit of the model was first evaluated using the chi square statistic and the Root Mean Square Error of Approximation. The chi square value of 192.375 with 98 degrees of freedom yielded a relative chi square value of 1.963, which is below the recommended threshold of 3.0 and indicates an acceptable model fit. This result suggests that the discrepancy between the observed covariance matrix and the model implied covariance matrix is minimal. In addition, the RMSEA value of 0.045 is well below the recommended upper limit of 0.08, indicating a close and satisfactory fit between the proposed Emotional Intelligence measurement model and the population data (Awang, 2018).

Incremental fit indexes were subsequently examined to compare the proposed measurement model with a null or baseline model. The Comparative Fit Index recorded a value of 0.977, the Incremental Fit Index was 0.977, and the Tucker Lewis Index was 0.972. All of these values exceed the recommended minimum threshold of 0.90, demonstrating that the Emotional Intelligence measurement model represents a substantial improvement over the null model and fits the data well (Hair et al., 2019). High values of these indexes indicate that the hypothesised factor structure is consistent with the observed relationships among the measurement items.

Parsimony was assessed using the normed chi square value, which considers model fit in relation to model complexity. The obtained value of 1.963 is below the recommended cutoff value of 5.0, indicating that the model achieves an appropriate balance between simplicity and explanatory power (Hair et al., 2019). This finding suggests that the Emotional Intelligence measurement model is not over specified and remains both theoretically and statistically efficient.

Overall, the goodness of fit results provides strong empirical evidence supporting the construct validity of the Emotional Intelligence measurement model. The satisfactory values across absolute, incremental, and parsimonious fit indexes confirm that the four-dimensional structure of Emotional Intelligence is well specified and appropriately represents the underlying data. These findings indicate that the Emotional Intelligence construct is validly measured within the policing context and is suitable for inclusion in subsequent structural analyses.

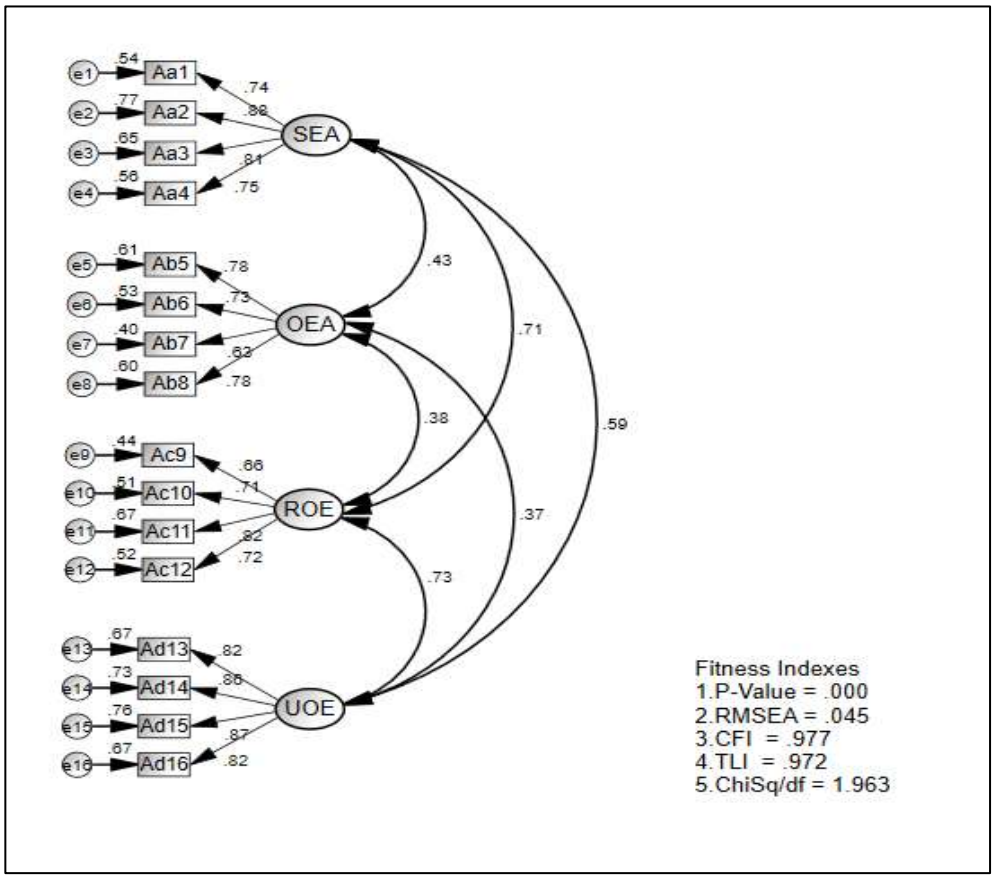

Figure 1: The CFA results for Emotional Intelligence constructs

Convergent Validity and Discriminant Validity

Convergent validity of the Emotional Intelligence construct was assessed to determine the extent to which the indicators of each dimension are strongly correlated and accurately represent their respective latent constructs. In accordance with established guidelines, convergent validity is considered satisfactory when factor loadings exceed 0.50, composite reliability values exceed 0.70, and average variance extracted values are above the minimum threshold of 0.50 (Hair et al., 2019; Awang, 2018). Collectively, these criteria indicate that the indicators share a sufficient proportion of variance in measuring the same underlying construct.

The results indicate that all retained indicators for the Emotional Intelligence dimensions recorded standardised factor loadings above the recommended threshold of 0.50. In addition, the composite reliability values for selfemotion appraisal, others' emotion appraisal, regulation of emotion, and use of emotion exceeded 0.70, demonstrating satisfactory internal consistency. The average variance extracted values for all four dimensions also exceeded 0.50, indicating that each construct explains more than half of the variance in its observed indicators. These findings confirm that convergent validity of the Emotional Intelligence construct has been adequately established.

Table 5: Discriminant Validity (Fornell–Larcker Criterion)

Construct	**SEA**	**OEA**	**UOE**	**ROE**
Self-Emotion Appraisal (SEA)	**0.794**			
Others' Emotion Appraisal (OEA)	0.563	**0.841**		

Use of Emotion (UOE)	0.498	0.576	**0.732**	
Regulation of Emotion (ROE)	0.421	0.509	0.467	**0.729**

Discriminant validity was examined to ensure that each dimension of Emotional Intelligence is empirically distinct from the other dimensions in the measurement model. Discriminant validity is achieved when a construct shares more variance with its own indicators than with other constructs included in the model. In this study, discriminant validity was assessed using the Fornell and Larcker criterion.

As presented in Table 5, the square root of the average variance extracted for each Emotional Intelligence dimension is greater than the corresponding inter construct correlations. This result indicates that each dimension shares a greater proportion of variance with its own indicators than with other dimensions. Accordingly, discriminant validity among the four dimensions of Emotional Intelligence is satisfactorily established.

Table 6: Convergent Validity and Reliability of Emotional Intelligence

Construct	No. of Items	CR	AVE
Self-Emotion Appraisal (SEA)	4	0.872	0.630
Others' Emotion Appraisal (OEA)	4	0.906	0.707
Use of Emotion (UOE)	4	0.820	0.535
Regulation of Emotion (ROE)	4	0.819	0.532

Convergent validity and internal consistency reliability were assessed using composite reliability and average variance extracted. As presented in Table 6, all composite reliability values exceed the recommended threshold of 0.70, indicating satisfactory internal consistency reliability. In addition, the average variance extracted values for all Emotional Intelligence dimensions exceed the minimum threshold of 0.50, demonstrating adequate convergent validity. These results confirm that the Emotional Intelligence construct is measured reliably and that the observed indicators adequately represent their respective dimensions.

Overall, the findings indicate that the Emotional Intelligence construct satisfies both convergent and discriminant validity requirements. The indicators converge well within their respective dimensions, while the dimensions are clearly differentiated from one another. Collectively, these results confirm that the Emotional Intelligence measurement model is valid and reliable, thereby supporting its suitability for inclusion in subsequent structural analyses.

DISCUSSION

This study aimed to validate the measurement of Emotional Intelligence within the policing context using a confirmatory factor analysis approach. The findings provide strong empirical support for the multidimensional conceptualisation of Emotional Intelligence, consisting of self-emotion appraisal, others' emotion appraisal, use of emotion, and regulation of emotion. The discussion focuses on interpreting the measurement model results, particularly goodness of fit, convergent validity, and discriminant validity, and considers their implications for research on emotional intelligence in law enforcement.

The confirmatory factor analysis results indicate that the Emotional Intelligence measurement model demonstrates a good fit with the observed data. The satisfactory values obtained across absolute, incremental, and parsimonious fit indexes suggest that the hypothesised factor structure adequately represents the Emotional Intelligence construct among police officers. This finding is important because it confirms that Emotional Intelligence, as operationalised in this study, is both structurally sound and empirically meaningful within a highstress and highly regulated occupational environment. The improvement in model fit following the removal of a weak indicator further highlights the importance of context specific validation when applying established measurement instruments in policing settings.

The results related to convergent validity further strengthen confidence in the measurement model. All Emotional Intelligence dimensions recorded standardised factor loadings above the recommended threshold, indicating that the retained items are strong indicators of their respective constructs. In addition, composite reliability values

exceeded the recommended minimum level, demonstrating satisfactory internal consistency across all dimensions. The average variance extracted values also surpassed the minimum threshold, indicating that each dimension explains a substantial proportion of variance in its observed indicators. Collectively, these findings confirm that the indicators within each Emotional Intelligence dimension converge well and accurately represent the underlying emotional competencies of police officers.

The establishment of discriminant validity provides additional evidence of the robustness of the Emotional Intelligence measurement model. The results indicate that each dimension of Emotional Intelligence is empirically distinct from the others, as demonstrated by the square root of the average variance extracted values exceeding the corresponding inter construct correlations. This finding is particularly important given the conceptual overlap that often exists among Emotional Intelligence dimensions. The ability to empirically distinguish between emotional appraisal, emotional utilisation, and emotional regulation suggests that police officers may possess varying emotional strengths and limitations across different dimensions, rather than exhibiting Emotional Intelligence as a single undifferentiated trait.

From a theoretical perspective, these findings support the view that Emotional Intelligence is best understood as a multidimensional construct, particularly in emotionally demanding professions such as policing. The validated measurement model is consistent with Emotional Intelligence theory, which emphasises the interrelated yet distinct nature of emotional appraisal, emotional use, and emotional regulation. This multidimensional structure allows for more nuanced examination of how specific emotional competencies influence behavioural and psychological outcomes in occupational contexts.

Within the policing environment, the validated Emotional Intelligence construct also has important practical implications. Police officers frequently encounter emotionally charged situations that require rapid judgement, emotional restraint, and interpersonal sensitivity. The confirmation that Emotional Intelligence can be reliably and validly measured among police officers suggests that this construct can be meaningfully incorporated into future research, training programmes, and organisational interventions. For instance, targeted training initiatives may focus on strengthening regulation of emotion to reduce misconduct or enhancing others' emotion appraisal to improve interactions with the public.

Overall, the discussion of the measurement model findings demonstrates that Emotional Intelligence is a valid and reliable construct within the policing context. The strong goodness of fit, convergent validity, and discriminant validity provide a solid foundation for subsequent structural analyses examining the role of Emotional Intelligence as a mediating or moderating variable. These findings contribute to the growing body of literature on Emotional Intelligence in law enforcement and support its relevance as a key psychological resource for managing stress and regulating behaviour in demanding occupational environments.

Implications for Human Resource Management

Emotional Intelligence in Recruitment and Selection

The findings suggest that Emotional Intelligence can be systematically incorporated into recruitment and selection processes for law enforcement officers. Emotional competencies such as self-emotion appraisal, regulation of emotion, and others' emotion appraisal are critical for managing stress, exercising discretion, and maintaining ethical conduct in emotionally charged situations. The validated Emotional Intelligence scale enables human resource practitioners to assess these competencies during the selection process, thereby improving person-job fit and reducing the likelihood of maladaptive behavioural outcomes. Integrating Emotional Intelligence assessment alongside cognitive and physical evaluations may further enhance the identification of candidates who are psychologically equipped to perform effectively in high pressure policing roles. By considering emotional competencies at the entry stage, law enforcement agencies may strengthen workforce resilience and promote professional conduct in demanding operational environments.

Training and Development Applications

The multidimensional nature of Emotional Intelligence highlighted in this study enables human resource departments to design targeted training and development programmes. Rather than treating Emotional Intelligence as a single global trait, training initiatives can focus on specific dimensions such as improving regulation of emotion or enhancing sensitivity to others' emotion appraisal. Such targeted interventions may strengthen officers' capacity to cope with occupational stress, manage interpersonal conflict, and sustain effective performance under pressure. In addition, the validated Emotional Intelligence scale can be used to evaluate the

effectiveness of training and development initiatives by assessing changes in Emotional Intelligence competencies over time. This allows organisations to adopt evidence-based approaches to professional development and to ensure that training programmes produce measurable improvements in emotional functioning among police officers.

Screening and Risk Management in High-Stress Occupations

Emotional Intelligence assessment may serve as a proactive screening tool for identifying officers who are at greater risk of emotional strain or behavioural difficulties in high-stress operational environments. Officers who demonstrate lower levels of emotion regulation or emotional awareness may benefit from early support or targeted developmental interventions before stress escalates into burnout or misconduct. From a human resource perspective, incorporating Emotional Intelligence into ongoing assessment practices supports preventive risk management and contributes to safer and more sustainable workforce practices within policing and other high risk public service occupations. By identifying emotional vulnerabilities at an early stage, organisations can implement timely interventions that promote officer wellbeing, ethical conduct, and long-term organisational effectiveness.

Human Resource Interventions for Emotional Regulation

The strong validation of the regulation of emotion dimension underscores the importance of emotional regulation as a core human resource competency in law enforcement. Human resource practitioners can use this insight to design targeted interventions aimed at strengthening emotional self-control, including resilience training, stress management workshops, coaching, and peer support programmes. Enhancing officers' emotional regulation capabilities not only supports individual wellbeing but also contributes to positive organisational outcomes by reducing emotional exhaustion, interpersonal conflict, and counterproductive behaviour.

Overall, the validated Emotional Intelligence scale provides human resource managers with a robust and practical tool for integrating emotional competencies into recruitment, training, development, and employee support systems. By embedding Emotional Intelligence within human resource strategies, law enforcement organisations can promote ethical conduct, psychological resilience, and sustained performance in demanding occupational environments.

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