

Stress, Coping, burnout and mental health in the Irish Police Force

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Abstract

The aims sought to identify the sources of stress and coping responses and their relationship to burnout and mental health in Irish police officers and to explore gender differences and differences between those 'at risk' or 'not at risk' of a stress-related illness. The unpredictable nature of police work, dealing with the public and potential criminals in often trying circumstances and the ever-present risk of danger and trauma, makes police work one of the most stressful of human-service professions. This area is under-researched in Ireland. A survey was administered, in 2019, to 104 full-time Garda members of the An Garda Síochana, measuring organisational and operational stress, coping style and wellbeing. Organisational stress was a stronger predictor of emotional exhaustion and operational stress of depersonalization. Venting, which, in a supportive environment is usually associated with good coping, had an adverse effect on burnout. This suggested a work environment where individuals felt unsupported. Females experienced higher burnout and more adverse mental health. They reported greater organisational stress, and this may relate to real or perceived gender-based barriers. Age had a protective effect, and this suggests there is scope to improve coping through mentoring schemes or other initiatives to cascade good coping.

Keywords Police stress · Coping · Burnout · Wellbeing · Mental health

Stress in Policing

The Irish police force, or An Garda Siochána ('Guardians of the peace'), was established in 1922. It is made up of approximately 14,000 officers, mostly unarmed and mostly rank and file (approximately 12,000). The nature of police work is inevitably associated with a range of stressors, from operational demands, such as dealing with the public, with criminals and violent offenders, with shift work, along with organisational demands, such as administrative duties, dealing with red tape, covering for absent colleagues and writing reports. Dåderman and Colli (2014) explored stress in the Norwegian police and found that dealing with traumatic and dangerous incidents was the main predictor of health, job satisfaction and burnout. Similar results were observed in the USA (Violanti and Aron 1995) and the UK (Oginska-Bulik 2005).

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Following criticisms of the lack of support within the police force in Ireland, an external 'cultural audit', by Price-Waterhouse-Coopers, was commissioned by the An Garda Síochána in 2017 and published in May 2018. Results highlighted widespread frustration among frontline officers, a supervision vacuum, feeling disillusioned, burnout and adverse mental health. A perception that the promotion system was often unfair was also widespread. The report concluded that the norms within the organisation suggested a cultural shift was needed (Fallon 2018).

Understanding Stress

The transactional model of stress (Lazarus and Folkman 1987), compared to the models that preceded it, placed psychological and social factors front and centre in recognising and interpreting demands (the primary appraisal) and in managing those demands (the secondary appraisal). Individual interpretations could lead to the judgement that the stressor was irrelevant, a challenge or a threat. Along with the results found by Price-Waterhouse-Coopers (2018), Fallon (2018), in a report commissioned by the Garda Representative Association, identified that organisational



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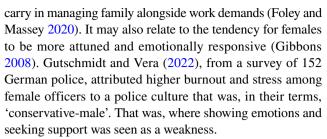
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stressors had a bigger impact on wellbeing than operational stressors. This is consistent with Conn's (2016) review on stress in policing. The secondary appraisal refers to range of influences on how one copes, such as levels of control and support and coping style. Dåderman and Colli (2014) found support the strongest buffer to occupational stress in a sample of Swedish police officers (n = 101), and Inzunza (2015) argues officers cope better where they are able to offer and to be receptive to receive support and this is more likely where one scores higher in empathy. However, the challenging nature of police work can increase the tendency to become emotionally distant towards others and this can lower the effectiveness of support as a coping mechanism.

The Effects of Stress on Mental Health and Burnout

Psychological burnout is one commonly reported measure of stress effects. It is particularly associated with service professions, such as the police and nurses, who experience a high level of occupational stress (Bakker and Heuven 2006; Foley and Massey 2020; Gibbons 2009a, b). Maslach and Jackson (1986) define burnout in terms of three elements emotional exhaustion or feeling emotionally fatigued. Depersonalisation or feeling detached from one's thoughts and sense of self. It is associated with increased cynicism, feeling emotionally numb and feeling that you are almost an observer to your own actions and, as Inzunza (2015) found, it works against the effective uses of support systems within the police. The final element is the degree to which one feels a sense of personal achievement. Burnout is experienced where emotional exhaustion and depersonalization are high and personal achievement low. It is commonly reported among professionals whose work can involve intense interactions with clients, such as, for the police, with members of the public. The experience of cynicism, associated with depersonalisation, has been widely reported in the police (Hickman et al. 2004; Inzunza 2015) and it has been strongly associated with adverse health outcomes (Bakker and Heuven 2006; Richardson et al. 2006). However, it is a relatively under-researched area in the Irish context. In a study among officers serving in the Netherlands, increased burnout was associated with reduced 'functional dominance' or being dominant where it is instrumental and appropriate to be (Jones and Newburn 2002). Being assertive and forthright is an important quality at critical moments in policing to diffuse and pre-empt conflict becoming unmanageable. Failing to be assertive when needed can increase interpersonal stress and compound its adverse effect on mental health.

Female, compared to male, officers typically report higher levels of burnout (Foley and Massey 2020). This has been attributed to the greater responsibility females frequently



A widely used measure of self-reported mental health is the General Health Questionnaire (Goldberg and Williams, 1988), with approximately 14–18% of the general population categorised as 'at risk' of developing a stress-related illness based on this measure (Gibbons 2022). This is not a life-threatening illness but complaints ranging from tension headaches, back problems, mouth ulcers and cold sores to digestive and intestinal problems to mood swings and irritability. Among police populations, those 'at risk' have been reported to be in excess of 35% (Kaur et al. 2013) and it is higher in those who experience strong emotional encounters in their work, such as managing aggressive behaviour or dealing with aftermath of loss and trauma (Thornton and Herndon 2016).

Contrary to expectations, Thornton and Herndon (2016) found no difference in GHQ score, irrespective of the number of critical incidents officers had experienced. It was anticipated that the greater the stress loading, the greater the risk. That none was found suggests that gender, age, the nature and frequency of the incidents, experience and coping style are important moderating factors.

In research across several police and human service professional samples, females score higher than males on GHQ (Acquadro Maran et al. 2015; Collins and Gibbs 2003; Gibbons 1998; Murray-Gibbons and Gibbons 2007) and on burnout too. Acquadro Maran et al. (2015), for example, found, from a study of stress and coping in Italian police (n=617), that policemen were more likely to be involved in critical incidents than policewomen and this was linked to the higher incidence of PTSD symptoms among male officers. However, females scored higher on GHQ and burnout and this has been attributed to perceived barriers in the workplace, in terms of being accepted and gaining the same recognition from colleagues in what remains a male-dominated profession. The same study found that females reported higher stress associated with organisational than operational demands. This may reflect the kind of gender bias Gutschmidt and Vera (2022) found in their German study, together with sex differences in stress exposure reported in earlier studies (Acquadro Maran et al. 2015; Conn 2016).

Coping with Stress

The brief cope (Carver 1997) is one of the most widely used measures of adaptive and maladaptive coping among human service professionals, including in the police (Acquadro



Maran et al. 2015; Kaiseler et al. 2014; Louw and Viviers 2010). Adaptive or positive coping can include the use of support and active coping, reframing, planning, humour and venting. Maladaptive or negative coping can include avoidance, such as behaviour disengagement, turning to alcohol or other substances, denial and self-blame (Gibbons and Morgan 2015). Fallon (2018), in the report commissioned by the Garda Representative Association, found that officers reported an absence of feeling supported, especially in relation to the emotional issues associated with work. Acquadro Maran et al. (2015) measured coping in their study and, in multiple regression analyses, found self-blame and avoidance positively correlated with distress and humour and planningbased coping was negatively associated. These types of coping will be explored in relation to the sources and effects of stress among serving officers in An Garda Síochana.

The aims sought to explore the relationship between the sources of stress and their effects on mental health and burnout, along with the influence of gender and coping behaviour on mental health and burnout. Replication research in this area is important, especially in areas of social and health psychology where replications frequently fail (Nosek et al. 2015). Moreover, these areas have been explored in policing outside Ireland but it is under-researched in Ireland and for this reason the hypotheses are non-directional.

- 1. There will be a sex difference in sources of stress (operational and organisational demands), in coping styles and in wellbeing (mental health and burnout).
- 2. There will be differences in coping style between those 'at risk' and 'not at risk' of stress-related illness.
- 3. There will be correlations between the sources of stress and influences on coping (age, gender, coping style) on burnout.
- There will be correlations between the sources of stress and influences on coping (age, gender, coping style) on mental health.

Methods

Design

A survey-based, correlational design was employed. The predictor variables were age, gender, sources of occupational stress (i.e. organisational and operational demands) and coping influences. The outcome variables were burnout and mental health.

Participants

An opportunity sample of 104 police officers (Garda) were recruited (61 male and 43 female). Inclusion criteria were

officers who had the rank of Garda or Constable and were full-time. Exclusion criteria were those part-time or on jobshare. The age of the participants ranged from 21 to 60 years (M=33, SD=8).

Materials

Respondents completed a 90-item questionnaire. It included a brief and instructions and gathered information on demographics, sources of stress, coping style, burnout and general mental health.

The 26-Item Police Stress Questionnaire (McCreary and Thompson 2006)

Items asked about operational and organisational demands, e.g. 'the risk of being injured on the job' (operational) and 'excessive administrative duties' (organisational). Participants responded on a seven-point scale, from 1 'no stress at all' to 4 'moderate stress' and to 7 'a lot of stress'. Cronbach's alpha for operational demands was 0.90 and for operational demands 0.91.

The Brief Cope (Carver 1997)

This is a context-free measure of coping. The 28 items split into 14 types of coping, with two items measuring each type. Participants respond on a four-point scale from 1 'I have not been doing this at all' to 4 'I have been doing this a lot'. An example item includes 'I have been criticising myself' (self-blame). The Appendix reports Cronbach's alpha for the 14 subscales. Only self-distraction fell below the reliability threshold, and it was excluded from the analyses.

General Health Questionnaire (GHQ) (Goldberg and Williams 1988)

This is a 12-item scale measuring mental health. Respondents answer on a four-point frequency scale. GHQ measures general levels of self-confidence, happiness, anxiety, depression and sleep disturbance. An example item is 'have you recently been able to concentrate on whatever you're doing?' Response options include 'better than usual', 'same as usual', 'less than usual', or 'much less than usual'. The scale measures transitory distress. Goldberg and William's (1988) scoring rubric was used, with responses keyed of 0–3 to determine GHQ totals, used as a measure of mental health, and a scoring key of 0, 0, 1, 1 used to determine 'caseness' or those 'at risk', with totals on this second scoring key above 3 indicating a risk of developing a stress-related illness. Cronbach's alpha for the GHQ was 0.917.



The Maslach Burnout Inventory (Maslach and Jackson 1986)

This 22-item scale measures the three components of burnout—emotional exhaustion, depersonalization and personal achievement. Participants responded on a seven-point scale from 'never' to 'everyday', scored 0–6, on how frequently they experienced the state described. A sample item includes 'I feel emotionally drained from my work' (measuring emotional exhaustion). Cronbach's alpha for the subscales were emotional exhaustion 0.942, depersonalization 0.759, and personal achievement 0.763.

Procedure

Permission to carry out the research was obtained from the Dublin (Templemore) police authority, and participant information sheets, consent forms and the questionnaires were distributed to stations in rural and urban areas across Ireland, including counties Dublin, Monaghan, Louth, Galway, Clare, Westmeath, Cork, Laois, Offaly and Wicklow. Twenty were issued to each selected station, with approximately 50% returned from each. All officers at these stations were informed of the study and invited to take part.

The brief explained that the questionnaire took 10–15 min to complete, that participation was voluntary and anonymous and they were free to stop at any time and that informed consent was assumed if the questionnaire was completed. All ethical considerations and methods were executed in accordance with the Declaration of Helsinki.

Results

The analyses explored gender differences on stress demands, coping behaviour, mental health and burnout (Table 1) and differences between those 'at risk' and 'not at risk' of a stress-related illness on stress demands and coping behaviour (Table 2). To test linearity, correlations were run between the predictors—gender and types of coping, against mental health (GHQ) and burnout (Table 3). The linearity assumption was met where predictors were significant or trending to significance. Regression and normality assumptions were checked and confirmed, and the guidelines proposed by Baron and Kenny (1986) were followed to arrive at the most parsimonious models. The final regression models tested the relationship between sources of stress and coping against the three components of burnout (Table 4, 5 and 6) and against mental health (Table 7). The data was analysed using SPSS version 27.

As illustrated in Table 1, females, compared to males, scored higher on operational demands, on behavioural disengagement, positive reframing and planning. They also reported a higher adverse mental health and were higher

on emotional exhaustion and depersonalization. The results offer support for H1.

In Table 1, the alpha coefficient was set to p < 0.003 as a correction for running multiple t tests on types of coping. On caseness, 59.62% (n = 62) were 'not at risk' and 40.38% (n = 42) were 'at risk'.

Those 'at risk' scored higher on organisational and operational demands, and on denial, substance use, behaviour disengagement and self-blame compared to those 'not at risk'. The findings offer support for H2.

In Table 3, no corrections were employed as the correlations were run only to test the linearity assumption for running regressions. Only predictors significant or trending to significance were entered into the regression analysis.

The R^2 explained 59.7% of the variance and the adjusted R^2 explained 57.1% of the variance in scores on emotional exhaustion. The results of the analysis offered partial support for H3.

The R^2 explained 33.3% of the variance and the adjusted R^2 explained 31.3% of the variance in scores on depersonalization. The results of the analysis offered partial support for H3.

The R^2 explained 14.8% of the variance and the adjusted R^2 explained 13.1% of the variance in scores on personal achievement. The results offer partial support for H3.

The R^2 explained 39.5% of the variance and the adjusted R^2 explained 36.4% of the variance in scores on mental health. The results offer partial support for H4.

Discussion

Table 1 shows that females found the operational demands of their work a greater challenge than males. This finding is consistent with Acquadro Maran et al. (2015). Female officers try to meet this challenge through a range of coping strategies and they score higher than males on what Carver (1997) broadly classifies as both positive coping (such as reframing and planning) and negative coping (such as behavioural disengagement). The explanations offered for earlier similar findings may apply here, notably that females pursuing a career frequently carry more family responsibilities than their male counterparts (Foley and Massey 2020). Females tend to be more emotionally responsive to their emotional state when completing measures of mental health and burnout (Gibbons 2008) and, within a policing context, females face institutional barriers that can impede their chances of success or, worse still, are discriminatory. This accords with the kinds of male bias Gutschmidt and Vera (2022) found in their German study.

In the general population, 14–18% are 'at risk' (Gibbons 2008). Kaur et al. (2013) reported a prevalence rate of 35%



Table 1 Descriptive and inferential statistics for gender differences on sources of stress, coping style, mental health and burnout

| | Sex of respondent | Mean | Std. deviation | t | Cohen's d effect size |
|---------------------------|-------------------|-------|----------------|---------|-----------------------|
| Organisational demands | Male | 72.67 | 16.39 | 0.71 | 0.141 |
| | Female | 74.88 | 14.64 | | |
| Operational demands | Male | 42.49 | 13.73 | 1.68** | 0.334 |
| | Female | 46.98 | 12.98 | | |
| Active coping | Male | 4.30 | 1.99 | 0.55 | 0.11 |
| | Female | 4.49 | 1.42 | | |
| Denial | Male | 3.02 | 1.54 | 0.65 | 0.13 |
| | Female | 3.21 | 1.41 | | |
| Substance use | Male | 3.08 | 1.60 | 0.03 | 0.01 |
| | Female | 3.09 | 1.59 | | |
| Emotional support | Male | 3.69 | 1.49 | 2.08 | 0.41 |
| | Female | 4.30 | 1.47 | | |
| Instrumental support | Male | 3.66 | 1.68 | 1.87 | 0.37 |
| | Female | 4.26 | 1.50 | | |
| Behavioural disengagement | Male | 2.87 | 1.15 | 2.13*** | 0.42 |
| | Female | 3.40 | 1.37 | | |
| Venting | Male | 4.31 | 1.89 | 1.28 | 0.25 |
| | Female | 4.77 | 1.65 | | |
| Positive reframing | Male | 3.87 | 1.60 | 2.29*** | 0.46 |
| | Female | 4.60 | 1.56 | | |
| Planning | Male | 4.07 | 1.82 | 2.27*** | 0.45 |
| | Female | 4.84 | 1.54 | | |
| Humour | Male | 4.44 | 1.91 | 1.29 | 0.26 |
| | Female | 4.93 | 1.88 | | |
| Acceptance | Male | 4.34 | 1.68 | 0.91 | 0.18 |
| | Female | 4.65 | 1.73 | | |
| Religion | Male | 2.92 | 1.54 | 0.50 | 0.10 |
| | Female | 3.07 | 1.47 | | |
| Self-blame | Male | 3.54 | 1.57 | 1.33 | 0.27 |
| | Female | 3.98 | 1.75 | | |
| Mental health (GHQ) | Male | 2.67 | 3.77 | 1.44* | 0.20 |
| | Female | 3.74 | 3.72 | | |
| Burnout | | | | | |
| Emotional exhaustion | Male | 34.38 | 14.36 | 2.59*** | 0.52 |
| | Female | 41.44 | 12.72 | | |
| Depersonalization | Male | 17.30 | 6.26 | 1.73** | 0.34 |
| | Female | 19.53 | 6.85 | | |
| Personal achievement | Male | 32.67 | 8.77 | 0.30 | 0.06 |
| | Female | 33.16 | 7.58 | | |

p < 0.1, p < 0.05, p < 0.003

in their police sample. In this study, it was 40%. This is markedly higher compared to most other human service professions (Gibbons 2010). Table 2 reveals that 'at risk' group was higher by moderate to large effect sizes on denial, substance use, behaviour disengagement and self-blame. These are generally regarded as maladaptive types of coping.

However, it is important to note that the types of coping measured are not dichotomously good or bad—it depends on individual and situational factors and how frequently a given type of coping is used. Individuals high on self-blame, for example, are often perceived by others to be good at their job. They tend to be high in diligence and take responsibility for aspects of their work that those lower in self-blame



Table 2 Descriptive and inferential statistics on sources of stress and coping between those 'at risk' and 'not at risk' of a stress-related illness

| | 'Risk' status | Mean | Std. deviation | t | Cohen's d |
|---------------------------|---------------|-------|----------------|---------|-----------|
| Organisational demands | Not 'at risk' | 70.44 | 15.68 | 2.56*** | 0.51 |
| | 'At risk' | 78.24 | 14.58 | | |
| Operational demands | Not 'at risk' | 40.23 | 13.46 | 4.04*** | 0.80 |
| | 'At risk' | 50.43 | 11.29 | | |
| Active coping | Not 'at risk' | 4.47 | 1.76 | 0.65 | 0.13 |
| | 'At risk' | 4.24 | 1.79 | | |
| Denial | Not 'at risk' | 2.74 | 1.29 | 3.08*** | 0.62 |
| | 'At risk' | 3.62 | 1.61 | | |
| Substance use | Not 'at risk' | 2.72 | 1.19 | 2.69*** | 0.59 |
| | 'At risk' | 3.62 | 1.92 | | |
| Emotional support | Not 'at risk' | 3.79 | 1.44 | 1.25 | 0.25 |
| | 'At risk' | 4.17 | 1.59 | | |
| Instrumental support | Not 'at risk' | 3.87 | 1.73 | 0.25 | 0.05 |
| | 'At risk' | 3.95 | 1.48 | | |
| Behavioural disengagement | Not 'at risk' | 2.77 | 1.05 | 3.20*** | 0.64 |
| | 'At risk' | 3.55 | 1.42 | | |
| Venting | Not 'at risk' | 4.27 | 1.81 | 1.57 | 0.31 |
| | 'At risk' | 4.83 | 1.75 | | |
| Reframing | Not 'at risk' | 3.95 | 1.52 | 1.63 | 0.33 |
| | 'At risk' | 4.48 | 1.71 | | |
| Planning | Not 'at risk' | 4.23 | 1.77 | 1.13 | 0.23 |
| | 'At risk' | 4.62 | 1.70 | | |
| Humour | Not 'at risk' | 4.40 | 1.97 | 1.58 | 0.32 |
| | 'At risk' | 5.00 | 1.77 | | |
| Acceptance | Not 'at risk' | 4.23 | 1.69 | 1.81 | 0.36 |
| | 'At risk' | 4.83 | 1.67 | | |
| Religion | Not 'at risk' | 2.84 | 1.30 | 1.10 | 0.23 |
| | 'At risk' | 3.19 | 1.77 | | |
| Self-blame | Not 'at risk' | 3.23 | 1.43 | 3.97*** | 0.79 |
| | 'At risk' | 4.45 | 1.70 | | |

^{***}p < 0.003. On 'caseness', 59.62% (n=62) were 'not at risk' and 40.38% (n=42) were 'at risk' of a stress-related illness

Table 3 Correlations between predictors—gender and types of coping and mental health and burnout

| | Mental health (GHQ) | Emotional exhaustion | Depersonalization | | Personal achievement |
|-------------------------|---------------------------|----------------------|-------------------|----------|----------------------|
| Sex of respondent | (===• | 0.1 | 0.25*** | 0.17* | 0.03 |
| Active coping | , | 0.01 | 0.15* | 0.01 | 0.32**** |
| Denial | | 0.43**** | 0.38**** | 0.33**** | 0.02 |
| Substance use | | 0.52**** | 0.38**** | 0.39**** | -0.14 |
| Emotional support | | 0.17* | 0.30*** | 0.14 | 0.12 |
| Instrumental support | | 0.08 | 0.20*** | 0.04 | 0.10 |
| Behaviour disengagement | | 0.42**** | 0.33**** | 0.34*** | -0.12 |
| Venting | | 0.22** | 0.46**** | 0.48**** | -0.11 |
| Positive reframing | | 0.15 | 0.16* | 0.04 | 0.24** |
| Planning | | 0.15 | 0.35**** | 0.11 | 0.25*** |
| Humour | | 0.18 | 0.23*** | 0.36**** | -0.04 |
| Acceptance | | 0.11 | 0.29*** | 0.16* | 0.16* |
| Religion | | 0.13 | 0.21** | 0.03 | 0.23** |
| Self-blame | | 0.36**** | 0.21** | 0.17* | 0.08 |

N = 104



 $[*]p\!<\!0.1,\, **p\!<\!0.05,\, ***p\!<\!0.01,\, ****p\!<\!0.001$

Table 4 Multiple regression with emotional exhaustion

| | Unstandardi | Standardised coefficients | |
|------------------------|-------------|---------------------------|----------|
| | В | Std. error | Beta |
| (Constant) | -13.45 | 4.96 | |
| Organisational demands | 0.35 | 0.08 | 0.42**** |
| Operational demands | 0.16 | 0.09 | 0.16* |
| Gender | 5.03 | 1.82 | 0.19*** |
| Venting | 2.37 | 0.62 | 0.32**** |
| Humour | -1.15 | 0.58 | -0.16** |
| Denial | 1.59 | 0.65 | 0.18*** |

p < 0.10, p < 0.05, p < 0.01, p < 0.01, p < 0.001

readily see as not their responsibility, and this can translate into a greater risk of developing a stress-related illness.

Most people, at different points across any one working year, will succumb to being 'at risk' as measured by the symptoms identified by the GHQ—it is a common experience and pushing oneself to develop new skills or manage new challenges requires a certain level of stress and that can, if experienced frequently, lead to a stress-related illness. So, one has to be cautious in drawing only a negative conclusion from prevalence rates on caseness.

In the regression analysis with emotional exhaustion, Table 4, organisational demands were the strongest predictor. These included the stress demands associated with co-workers, feeling that others are favoured over you, with admin demands and covering for absent colleagues.

In terms of coping, venting was the strongest predictor in an adverse way—as it increased, so too did emotional exhaustion. There is evidence that suggests that expressing emotions is good for wellbeing (Danner et al. 2001). However, it depends on the environment—expressing frustrations or difficulties is likely to leave one feeling worse or even inadequate if those around you are unresponsive or who respond in a way that suggests it is a weakness. It might be that respondents felt unsupported or not listened to by management, supervisors or co-workers. This accords with Gutschmidt and Vera's (2022) finding on gender bias in the police culture in Germany.

 Table 5
 Regression model for depersonalization

| | Unstandardised coefficients | | Standardised coefficients | |
|---------------------------|-----------------------------|------------|---------------------------|--|
| | В | Std. error | Beta | |
| (Constant) | 4.26 | 2.11 | | |
| Operational demands | 0.13 | 0.04 | 0.26*** | |
| Venting | 1.18 | 0.33 | 0.32**** | |
| Behavioural disengagement | 0.97 | 0.45 | 0.19** | |

p < 0.10, **p < 0.05, ***p < 0.01, ****p < 0.001

Table 6 Regression model for personal achievement

| | Unstandar | dised coefficients | Standardised coefficients |
|---------------|-----------|--------------------|---------------------------|
| Model | В | Std. error | Beta |
| (Constant) | 22.27 | 2.67 | |
| Age | 1.91 | 0.83 | 0.21*** |
| Active coping | 1.45 | 0.43 | 0.31**** |

p < 0.10, p < 0.05, p < 0.01, p < 0.01, p < 0.001

Gender was a predictor in the model, with females reporting higher emotional exhaustion. This is consistent with the *T*-test analyses in Table 1 and the same explanation is likely to apply. Denial was another predictor—the more this type of coping was used the greater was the emotional exhaustion. Denial is a form of avoidance and this finding is consistent with earlier research that finds avoidance unhelpful, even when used only infrequently (Gibbons 2010).

As with the model for emotional exhaustion, venting was the strongest predictor of depersonalization in Table 5—as it increased so too did levels of depersonalization. An organisational culture that normalises emotional expression or venting difficulties as a weakness is likely to lead to such a result. The same earlier explanation for operational demands and for behavioural disengagement which, like denial, is a type of avoidance, is likely to apply.

Table 6 shows that the more respondents used active coping, the greater was their sense of personal achievement. At one level this might be expected but research has found that it can often be associated with lower not higher personal achievement (Gibbons 2010). What is important is the level of competence one has in relation to the particular behaviour being engaged in. If that active coping involves having to learn something new, it is often associated with most adverse wellbeing. Where it has a positive effect, it refers to activities which, for the most part, the officer is well versed and competent in. A positive sense of achievement is more likely where one is able to draw on honed problem-based coping. This interpretation is supported by the evidence for the

Table 7 Regression model for mental health (GHQ)

| Model | Unstanda | Standardised coefficients | |
|------------------------|----------|---------------------------|---------|
| | В | Std. error | Beta |
| (Constant) | 13.52 | 2.30 | |
| Organisational demands | 0.06 | 0.03 | 0.17** |
| Denial | 0.70 | 0.36 | 0.18* |
| Substance use | 0.94 | 0.34 | 0.25*** |
| Self-blame | 0.85 | 0.31 | 0.26*** |

p < 0.10, p < 0.05, p < 0.01, p < 0.001



second predictor—age, which positively predicted personal achievement. This is likely to relate to the benefits gained from accumulated experience. After several attempts at dealing with most of the challenges involved in policing, one is likely to find ways of coping that pay dividends.

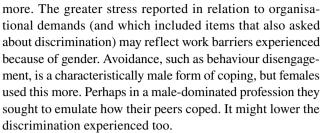
Moreover, one not only performs better with experience, but one reappraises demands in such a way as to be less stressed by them. This finding might also reflect other benefits that come from time in post, such as increased financial security, greater autonomy and work latitude and an improved work-life balance. So, with more manageable demands and improved coping, one has more cognitive reserve to draw on in managing stress.

The model for personal achievement explained the lowest variance. This suggests that the main sources of personal achievement were not work-related. Perhaps with age, the value and significance of one's life outside work is appreciated more. However, it might reflect a methodological issue the measure of the demands at work looked at work stress in the conventional way with stress synonymous with distress (McCreary and Thompson 2006). That is to say, respondents rate stressors from 'not at all stressful' to 'very stressful', such as 'leaders over-emphasise the negatives', 'negative comments from the public' and 'lack of resources'. While there is value in looking at stress in this way, it is incomplete and omits the positive, eustress element of police work. Additional items could be included, asking respondents to rate how much they felt uplifted by an experience with leaders or co-workers who 'emphasise the positives', by 'positive comments from the public', etc. It is important that a stress measure captures the entirety of the stress experience.

In relation to the regression with mental health, Table 7, self-blame and substance use and denial—the latter two being types of avoidance, were the strongest predictors of adverse mental health. This is consistent with earlier findings (Acquadro Maran et al. 2015; Fallon 2018; Gibbons and Morgan 2015), and similar to the findings in earlier models, organisational demands predicted adverse mental health. Interestingly, while the model revealed those types of coping that have an adverse effect, it offered no evidence for those types of coping, such as support, that are often found effective. This suggests that they were either not used frequently or that they had little impact if they were.

Summary

Females, compared to males, experienced higher burnout and more adverse mental health. They were stressed more by the demands involved in their work and they scored higher on both effective (positive reframing and planning) and ineffective (behaviour disengagement) coping techniques, and without the effective ones, their wellbeing may have suffered



Organisational or operational demands or both were predictors in most of the models on burnout and mental health. Organisational demands were a predictor of emotional exhaustion and operational demands a predictor of depersonalization. Consistent with the findings from other human service professions, exposure to taxing and often difficult and unpredictable interactions can, over time, lead to a sense of alienation and detachment from one's own emotional state (depersonalization). Venting, which, in a supportive environment is usually associated with good coping, had an adverse effect on burnout. This suggests a work environment where individuals felt unsupported or where voicing a need for help was seen as a weakness. Consistent with earlier findings, the use of avoidance (denial, substance use, behavioural disengagement) had an adverse effect on mental health.

Age was a predictor of personal achievement, suggesting that, as coping skills become honed, performance and sense of achievement improve. Those 'at risk' of a stress-related illness were higher in maladaptive coping; however, caution has to be taken in over-simplifying types of coping as either good or bad and most people, at some point, succumb to a stress-related illness. Experiencing stress that puts one 'at risk' is not just an indicator of overwhelming demands and poor coping but of pushing oneself to develop new skills.

Limitations and Recommendations

The sample size was just over a hundred, it was non-probabilistic and volunteer based and details were not gathered on whether officers worked in mainly urban or rural regions where policing demands are likely to vary. This means caution has to be taken in the conclusions drawn. While the survey was completed anonymously, it was completed or at least distributed and returned in the workplace and some respondents may have felt cautious about disclosing responses that reflect negatively on their policing experience. Add to this that common defence strategy to underestimate one's weaknesses, and it suggests that the scores associated with stress and adverse coping may have been higher without such influences.

Multiple regression analyses are among the most widely used statistical tools to explore datasets consisting of several predictors and outcome measures. However, it is a correlational analysis. Cause cannot be inferred and what is



construed as a 'predictor' or an 'outcome variable' is determined by the paradigm adopted by the researchers, as is the direction of influence. Experiences of burnout, for example, are just as likely to affect the perception of stress and the coping behaviour adopted, as the sources of stress and coping to influence burnout.

The Police Stress Questionnaire (McCleary and Thompson 2006) is a common and validated measure, but it only looks at stress in terms of degrees of distress. However, stress is necessary for optimal performance, even the stress that may be experienced as distressing. Adapting the response scale to also ask about the stress experiences necessary to facilitate performance would offer a more complete picture of the stress experience and its association with good coping.

The brief cope is a context-free measure. Respondents may have taken it to refer to how they coped outside as well as in work. The use of a measure framed in the context of a police work or which distinguished between work and non-work demands would have improved test validity.

The association between age and achievement suggests there is scope to improve coping through mentoring schemes or other initiatives that share effective coping practices. There were sufficient findings to raise questions about the perception, at least, of barriers in the workplace. This could be explored further and because the reasons appear varied—related to gender, or experience or work culture or to wider systemic reasons, it would be useful to explore this through a qualitative analysis.

Appendix. Cronbach's alpha for the brief cope subscales

| Brief cope subscales | Cronbach's alpho | |
|---------------------------|------------------|--|
| Self-distraction | 0.455 | |
| Active coping | 0.749 | |
| Denial | 0.631 | |
| Substance use | 0.883 | |
| Emotional support | 0.663 | |
| Instrumental support | 0.850 | |
| Behavioural disengagement | 0.704 | |
| Venting | 0.750 | |
| Positive reframing | 0.709 | |
| Planning | 0.706 | |
| Humour | 0.751 | |
| Acceptance | 0.709 | |
| Religion | 0.821 | |
| Self-blame | 0.737 | |

With each subscale comprising of just two items, a lower threshold of 0.6 or above was set (Sijtsma 2009). Self-distraction fell below the threshold and was excluded from the analyses.

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Author Contribution Dr. C. Gibbons undertook all elements of this study apart from data collection. This was undertaken by Mandy Lowe as part of her undergraduate thesis at Dublin Business School.

Data Availability The dataset is available at https://orcid.org/0000-0001-6631-721X

Declarations

Ethics Approval and Consent to Participate The study received ethics approval from the ethics committee at Dublin Business School.

Competing Interest The author declares no competing interests.

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