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Blue Light Programme Impact on the Public

Exploratory research



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1. Executive Summary

Mind's Blue Light Programme focuses on the mental health and wellbeing of emergency services ('blue light') personnel. Mind and their research partners have gathered data from existing strands of the Blue Light Programme to provide insight into and demonstrate the effect of the programme's activities on blue light staff members and volunteers (Mind and Future Thinking, 2015; Mind, 2016a, 2016b). However, such a programme does not operate in isolation: Blue Light Programme activities, and their impact on the wellbeing of personnel, can potentially result in outcomes for the wider public.

The existing evidence base demonstrated a link between the wellbeing of employees and their clients but was restricted to medical staff and patient interactions. Therefore, this research undertaken by NEF Consulting was commissioned to explore the link between the mental health and wellbeing of emergency services personnel and their ability to support members of the public who are experiencing mental health problems.

The research aimed to provide an overview of how engagement in the Blue Light Programme could potentially impact upon the public's experience of the emergency services; and also, to identify recommendations for further research to develop the evidence base. The research comprised of a mapping of the extant evidence base, into how the mental health of blue light services' staff can impact on members of the public; the development of a conceptual model to test the theoretical connections; and a review of the potential methodological approaches to measure whether the conceptual model holds in practice. The findings of the research were subject to review by a sample of staff working in the police, and fire and rescue services, and Mind. Any discussions about the potential impacts for those working in the ambulance service or in search and rescue, who were not involved in the research, would need to be further tested and explored in subsequent research.

The research identified a number of potential and aspirational outcomes for the Blue Light Programme. Staff working in blue light services perceived that the most important impact for end-users would be that a greater number of emergency staff would be available for work, as a result of reduced levels of illness and leave of absence. Other than the potential increase in resources, many of those engaged in the review found it harder to imagine or conceptualise other impacts that might result from the Blue Light Programme. Those who were able to envisage and express additional outcomes, were interested in and focused on how the knowledge and skills they developed for (self) care, could enable them to better support members of the public and families in a person-centred way. These outcomes were identified and conceptualised within a wider system of services that would need to align with a person-centred approach.

It was clear from a review of extant evidence that previous research gathered data which focused on the extent to which staff experienced outcomes relating to their mental health,

within blue light services and other sectors. This evidence focuses predominately on quantitative approaches to measuring change that do not provide the depth of contextualised understanding to be able to describe and measure the impact of Blue Light activities on end-users.

Developing a deeper insight into the public impact of the Blue Light Programme will require a multi-stage approach to research, in order to collect meaningful information about the outcomes (and interactions between outcomes) at a local level. It is proposed that this research will enhance both the conceptual understanding of the impact of the programme, and provide further evidence that can be used at an operational level, to support future decisions about investments in the Blue Light Programme and other mental health and wellbeing provision.

There is one caveat to these suggestions: an increase in the level of human resource available, as a result of emergency services staff being healthy and well at work, was seen by those engaged in this research as being the most important impact for the public. If the existing Blue Light Programme research, combined with internal data on staff presence, can provide evidence for whether this increase in resource is occurring, then further conceptual studies and evidence collection may not be considered the priorities at this time. The current research is therefore available to support Mind and partners to make an informed decision about how best to use and develop the evidence base, for the benefit of stakeholders working within the blue light services.

2. Introduction

Mind's Blue Light Programme focuses on improving the mental health and wellbeing of emergency services personnel. It also takes account of the positive impact that the wellbeing of blue light personnel can have on the wider public, with whom they interact. In particular, Mind is interested in the link between the mental health and wellbeing of emergency services personnel and their ability to support members of the public who are experiencing mental health problems.

The Blue Light Programme has developed a body of research into the needs of blue light personnel and the impact of the programme's current activities on individual participants (Mind, 2015, 2016b, 2016a; Mind and Future Thinking, 2015; BMG Research, 2016; Wilson *et al.*, 2016). Such research has been used to iterate and expand provision, to meet the needs of staff working in blue light services. Yet with mental health and wellbeing receiving ever-increasing attention and with a greater focus on outcomes-based solutions, there is a growing need to better understand how emergency services deliver their services, to meet the broader needs of local people.

In addition to research undertaken for the Blue Light Programme, there is a small evidence base that connects the wellbeing of employees with that of their clients or the end-users of services. However, much of this research is concentrated in the medical field, and as such cannot be directly applied to blue light personnel operating in a particular working environment.

Mind therefore commissioned this exploratory research to:

- Further identify the key wellbeing drivers of emergency service staff's support for the wider public, including those members of the public experiencing poor mental health and wellbeing.
- Identify ways to test the theoretical connection between key wellbeing drivers and broader wellbeing outcomes.
- Indicate the future direction of broader programmes of research.

The research entailed, firstly, mapping the extant evidence base (on how the mental health of staff can impact members of the public) based on research questions co-designed with Mind; and searching for relevant studies, using Google Scholar, Deepdyve and library search functions. In addition, desk research was undertaken into the methodological approaches used to gather data on the impact of the wellbeing of staff on members of the public.

Secondly, a series of qualitative discussions were held with members of the police and the fire and rescue services. Two workshop discussions (involving 20 people) were held with personnel from the fire and rescue services, who had attended a conference on trauma

support in the emergency services (that included input from Mind's Blue Light Programme). A question was inserted into the Work2health and Work Research Centre survey of Blue Light Champions in Wales, which was undertaken as part of the independent evaluation of the Blue Light Programme in Wales. A further seven telephone interviews were held with participants from across the emergency services who were already engaged with the Blue Light Programme.

The insights gathered through the literature review and the qualitative engagement led to the development of a conceptual model, referred to as the emergent Theory of Change. The model was designed to test theoretical connections between outcomes for individuals engaged in the programme, and outcomes for members of the public who encounter services provided by those individuals. The findings, which related to both the Theory of Change, and the desk research into methodological approaches, were subject to review by a sample of staff working in the police and fire services, and Mind. Those working in ambulance and search and rescue did not participate in this research.

The findings of each stage were synthesised and are presented in the subsequent chapters of this report, alongside recommendations for future research.

3. Rapid Literature Review

Scope

The rapid literature review outlined the key research findings on the link between the mental health of emergency front-line workers and the impact on their work performance (both positive and negative), and the subsequent impact on members of the public.

There is a body of research that focuses on NHS staff (nurses, in particular), the immense stress and workload they have to manage, and how this affects their wellbeing. Some of the research further explores the impact on their job performance and, as a consequence, the patient experience. This chapter will extend this understanding to include other front-line emergency ('blue light') personnel, such as police officers, firefighters, paramedics and search and rescue.

We address the following research questions:

- 1) What does the literature say about the impact of poor/ good mental health of emergency front-line workers on the public?
- 2) How can reducing stigma and increasing awareness (of mental health) impact on the mental health of emergency staff and how this subsequently affects the experiences of the public?
- 3) How can increased wellbeing for emergency front-line workers affect the experiences of the public?
 - a) How can emergency staff bring their lived experience of mental health to their interactions with members of the public?

For the purposes of this review, we will use the concept of functioning to frame a summary of the evidence of how initiatives such as the Blue Light Programme could impact on members of the public.

“Functioning at work is about whether the things that employees do in their day-to-day work create positive interactions with their surroundings and helps them to meet their basic psychological needs. It includes whether they feel they can express themselves, use their strengths, and have a sense of control over their work” (Jeffrey et al., 2014, p. 33).

Wellbeing at work and good functioning

There is a growing body of research exploring the links between subjective wellbeing and a person's psychological and physiological functioning, and how it affects the ability to do their job (Wright and Cropanzano, 2000; Kuykendall and Tay, 2015). The evidence shows

that people who achieve good standards of wellbeing at work are less likely to suffer from prolonged periods of stress or more serious mental health problems (Bonde, 2008; Jeffrey *et al.*, 2014; Madsen *et al.*, 2017; Mental Health Foundation, 2018). Employees are 'likely to be more creative, more loyal, more productive and provide better customer satisfaction than those with poor levels of wellbeing at work' (Jeffrey *et al.*, 2014, p. 6).

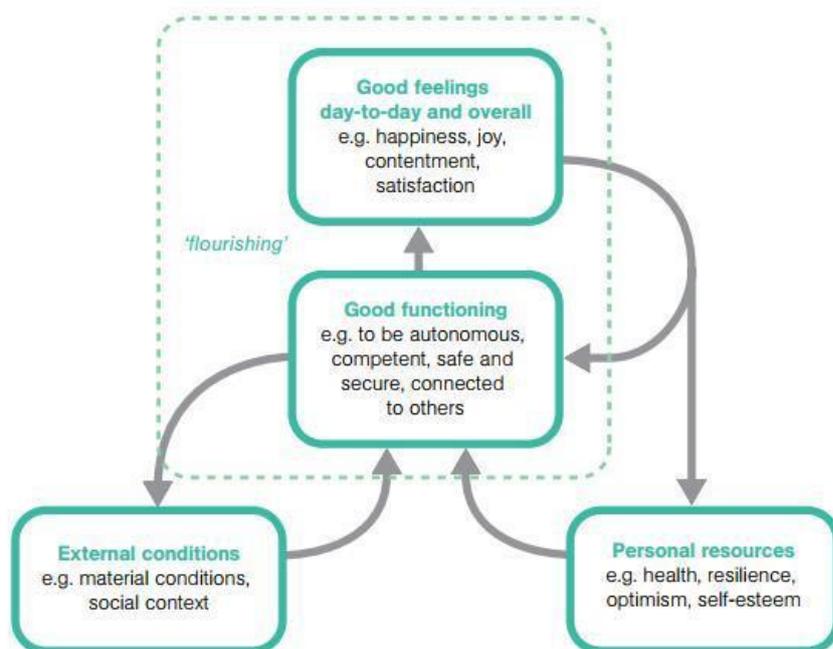
In contrast, people who are often overworked, have little autonomy and are constantly stressed in their workplace tend to have low self-esteem, low job satisfaction and low productivity (Rüsch, Angermeyer and Corrigan, 2005). They often attend work when they are unfit and unwell (Boorman, 2009). This phenomenon, known as presenteeism, can lead to errors being made, that put clients and end-users (such as patients) at risk (West *et al.*, 2006; Gärtner *et al.*, 2010; Garrow, 2016; Farmer and Stevenson, 2017; Mental Health Foundation, 2017). Burnout can also lead to the depersonalisation of end-users.

Depersonalisation occurs when staff shut off the end-user or service-user, or become more callous towards them (West *et al.*, 2009). This may lead members of the public to experience low standards of care and a sub-standard experience, which could have an impact on their recovery (Cole-King and Harding, 2001).

There has been an increasing interest in wellbeing, and the drivers of wellbeing, amongst those working in research, in national and local government and in healthcare. NEF has conducted extensive research on the topic and has created the Dynamic Model of Wellbeing in relation to work, which shows succinctly the different features of wellbeing, and the relationships between them (Thompson and Marks, 2008). This research was undertaken in the UK as part of the Government Office for Science 'Foresight' programme. Through this programme, NEF developed a measurement framework that integrated different academic approaches to understanding wellbeing, into one coherent model.

As Figure 1 demonstrates, there is a link between the external conditions that an individual operates within, and their personal resources; which in turn influences how well each person is able to function.

Figure 1: The Dynamic Model of Wellbeing



Impact of the mental health of emergency front-line workers on the public

In the UK, one in four people will experience a mental health problem in any given year; although in 2014 this increased to 39% (NHS Digital, 2014). However, three quarters of people with mental health problems receive no treatment (Mental Health Foundation, 2015). Focussing first on workplaces, the evidence shows that around 15% of people experience mental health problems at work in the UK (Mental Health Foundation, 2017). It is also estimated that 300,000 people with long-term mental health problems will lose their jobs each year (Farmer and Stevenson, 2017). The impact of mental health problems carries a high cost for society as a whole. Evidence shows that 70 million days are lost from work each year due to mental ill-health, making it the leading cause of sickness absence (Mental Health Foundation, 2017).

Increasingly, evidence shows that staff wellbeing is not only important in its own right, it also has an impact on end-users, employers and society as a whole. There is a growing recognition of the relationship between staff wellbeing, their functioning or ability to do the job, and patient (end-user) care and satisfaction (Wright and Cropanzano, 2000). For example, the importance of the mental and physical health of staff, in the delivery of good care for end-users, was emphasised by the NHS Health and Wellbeing Review in 2009. The report states: *'There is a strong business case for investing in staff health and wellbeing. Organisations that prioritise it perform better, with improved patient satisfaction, stronger quality scores, better outcomes, higher levels of staff retention and lower rates of sickness absence'* (Boorman, 2009). By inference, the implications for organisations that are involved in supporting vulnerable people in high risk situations are high if not managed well: the poor mental

health of staff could affect their job performance, and consequently have an adverse impact on end-users' experience and the outcome of the service provided.

There is a wealth of evidence centred around NHS staff, and nurses in particular, that focuses on the impact of workload and stress on mental health and job performance. (Gärtner *et al.*, 2010; Poghosyan *et al.*, 2010; Dean, 2011; National Nursing Research Unit, 2013a). However, much less research has been undertaken in relation to emergency front-line workers such as firefighters, paramedics or police officers. This lack is significant as the nature of the work in emergency services differs from that in most other workplaces. Staff working in the emergency services are exposed, on a regular basis, to very challenging and often traumatic situations. Increasingly, they encounter people in mental health crisis; which when coupled with the volume of work across each service has a negative impact on emergency front-line workers' mental health and overall wellbeing (Mind, 2016a).

In a recent study, on the experiences of officers and staff exposed to injury while working in the police service (undertaken by the University of Surrey), police officers rated witnessing a serious injury to a colleague at work, as being the most stressful operational duty incident. This was followed by being physically assaulted or attacked whilst on duty. These findings highlight both the nature and impact of witnessing or experiencing an injury on duty (Police Dependants' Trust, 2016). Furthermore, the report found that 81% of the participants reported at least one physical or psychological injury, or mental health problem, whilst working for the police service. Overall, the study found that mental health problems and psychological injuries were a factor in over half of the injuries reported. Anxiety and depression were the most commonly reported psychological injuries or mental health problems, whilst a substantial number of participants (16%) reported taking time off due to Post-Traumatic Stress Disorder (PTSD) during the last five years (Police Dependants' Trust, 2016).

Ambulance personnel experience a significant number of traumatic incidents but do not have either the time or support to process such incidents. Coping mechanisms shared by staff in a survey included, "keeping thoughts and feelings to self" (82%), "avoiding thinking about what you are doing" (69%), and "talking with colleagues" (94%) (Alexander and Klein, 2001). Increasing numbers of those working within the fire and rescue services are on long-term leave of absence as a result of poor mental health, and due to organisational pressures (Mind, 2015); and research in both the UK and USA has found a high prevalence of suicidal thoughts or attempts by those working in ambulance services due to trauma encountered in their work (Alexander and Klein, 2001; Henderson *et al.*, 2016).

Farmer and Stevenson (2017) found that some public-sector roles, such as within the Armed Forces, emergency services, social work and the prison service, carry a significant degree of risk and can exacerbate mental health problems. The report concluded that employees in these high-risk roles require more targeted help, in relation to their mental health and in the form of clear accountability by the departments responsible.

'We recommend that public sector employers should identify employees at higher risk of stress or trauma and produce a national framework which coordinates support for these employees and establishes clear accountability for their mental health' (Farmer and Stevenson, 2017, p. 10)

However, despite increasing awareness of such issues at a strategic level, there is a pervasive culture of silence surrounding mental health, especially within workplaces, preventing people from disclosing their mental health problems and seeking help. In particular, evidence from Mind's Blue Light Programme, found that front-line emergency workers are generally less likely to talk about their mental health than the general population (Mind, 2016a). Furthermore, the wider stigma associated with mental ill-health in both front-line healthcare staff as well as patients has been found to 'create[s] serious barriers to access and quality care' for those with mental health issues, in terms of supporting both their physical and mental health needs (Knaak, Mantler and Szeto, 2017).

Notwithstanding the existing research and increasing knowledge of the prevalence of mental health issues within these services, there is little evidence of the impact of front-line workers' workload and stress on the end-users. We will, therefore, present the findings from the evidence of nursing staff and other sources, and infer what this could mean for other front-line staff.

Organisational pressures

Evidence shows that nurses are under immense pressure in the workplace. They are overworked and suffer from stress, burnout and negative organisational culture, such as bullying. In addition to this, nurses are often worried about job security and cuts to their terms and conditions of employment, as well as increasing scrutiny regarding the level of compassion they show to end-users (Royal College of Nursing, 2013). These (external) conditions can have an effect on their functioning at work. As a result, nurses suffer from stress, and other forms of mental health problems such as anxiety and depression. This literature will highlight three issues experienced by nurses that can also negatively impact end-users: presenteeism; secondary trauma stress and PTSD; and burnout and depersonalisation.

Presenteeism

High workload and stress, in addition to being harmful to staff wellbeing, can create the conditions for mistakes to happen, which can have a detrimental effect on end-users. Work-related stress leads nurses to attend work when they are unfit and unwell. Evidence shows that 'presenteeism' is a widespread problem among nurses. In one study, 82% of nurses reported they had gone to work despite being 'unwell or unfit' (Royal College of Nursing, 2013). Whilst the report does not specify how this relates to physical or mental health, the scoping research for the Blue Light Programme found that emergency services personnel more broadly are more likely to experience a mental health problem, but are less likely to take time off (Mind, 2016a).

'Presenteeism' has been found to be greater amongst those who work long hours and experience managerial pressure to return to work (Boorman, 2009). As well as increasing the risk of mistakes, 'presenteeism' can affect patients' perceptions of the care they have received: staff who they perceived to be 'just doing their job', as opposed to 'caring' were perceived to be offering bad care (National Nursing Research Unit, 2013b).

Similarly to nurses, other emergency front-line workers who work long hours, such as paramedics, police officers and firefighters, are also exposed to traumatic events and also suffer from work-related stress. According to research by the Police Dependents' Trust, police officers¹ report attending work when unfit (presenteeism) (2016). The scoping research for the Blue Light Programme found, via the survey, that members of staff across all blue light services reported that poor mental health had had a number of impacts on their performance at work. There were some differences across services, although at a lower level than the Chartered Institute for Personnel and Development (CIPD) baseline in almost all cases. In particular, over 60% of ambulance staff responding to the survey stated that they were less patient with the public (compared to less than 40% of police, and 25% of fire service staff) as a result of poor mental health (Mind, 2015).

It is important, therefore, to note that staff wellbeing is not only important in its own right, but is a necessary component in guaranteeing better experiences and outcomes for end-users. Royal College of Nursing research (2013) states that, 'individual staff wellbeing is best seen as an antecedent rather than as a consequence of patient care performance'.

Secondary trauma stress or Vicarious traumatisation and PTSD

Secondary traumatic stress (STS) is becoming viewed as an occupational hazard of providing direct services to traumatised populations i.e. the psychological effects of traumatic events that extend beyond those directly affected (Bride, 2007). Research shows that staff who work with people who are suffering the effects of trauma, may start to suffer from symptoms themselves (Baird and Kracen, 2006). The repeated and prolonged exposure to trauma via their work and their clients can gradually or quickly turn into stress, exhaustion and PTSD-like symptoms, particularly if the member of staff is close to the survivor, or ignores emotional self-care. Without appropriate support, this may affect the treatment that front-line workers are able to provide.

McCann and Pearlman's (1990) elaboration of the concept of vicarious traumatisation in relation to therapists, explained how the therapist may actually begin to incorporate into their schema painful images, thoughts and feelings associated with exposure to end-users' traumatic memories. A research synthesis of evidence around STS found evidence that the amount of exposure to trauma material combined with a person's own trauma history can affect whether STS occurs, and that such experiences can affect the wellbeing of staff – as measured through their assessment of life satisfaction (Baird and Kracen, 2006).

¹ A specific figure or percentage was not provided in the report.

Evidence suggests that similar results are seen in other front-line workers. Compared to the general population, emergency workers report higher levels of mental and physical health problems. A systematic review of ambulance personnel found a 20% prevalence rate of PTSD within ambulance staff (Sterud, Ekeberg and Hem, 2006). Another study of ambulance workers found that the prevalence of clinical levels of psychopathology is estimated to be around 20% to 30%, with post-traumatic stress disorder (PTSD) and depression being the most common mental health outcomes (Bennett *et al.*, 2004). This was further echoed in the Blue Light Programme's own survey of over 1,600 staff: '62 per cent said they had experienced a mental health problem – such as depression, anxiety disorder, OCD, PTSD, bipolar disorder or schizophrenia' (Mind, 2016c).

Evidence shows that the nature of emergency work does have an impact on mental health and emotional wellbeing. It is therefore worth reflecting on the extent to which adequate support is provided for front-line workers, with protection against the serious harmful effects of traumatic material, if end-users are to get the best care. A small number of studies have aimed to identify early predictors of later mental and physical health problems in emergency workers. For example, Wild *et al.* (2016) identified a set of early predictors of later poor mental and physical health in trainee paramedics. Rumination at the start of paramedic training predicted episodes of PTSD. Episodes of PTSD and depression were linked to poorer sleep, greater burn-out, more days off work and greater weight gain (Wild, 2016). Research has found that such experiences can affect the 'helper–client' relationship, with the staff member having a reduced ability to bear the load of supporting others (Phelps *et al.*, 2009). Although the evidence is not comprehensive, the implications of the reduced capacity to provide care and support could have a direct impact on members of the public.

Burnout and depersonalisation

Burnout is a condition covering three domains (depersonalisation, emotional exhaustion, and a sense of low personal accomplishment) that is associated with decreased work performance (Shanafelt *et al.*, 2002). For example, for ambulance staff, burnout was associated with reduced job satisfaction, shorter recovery time between incidents and more frequent exposure to incidents (Alexander and Klein, 2001). Burnout has a negative effect on professional performance and can lead to the depersonalisation of end-users. For those working in blue light services, the increasing exposure to those experiencing a mental health crisis may then result in the normalisation of such experiences and may reduce the ability of staff to be fully responsive to individual needs.

When people are going through a traumatic experience, they are at their most vulnerable point and it is essential they are cared for with kindness and compassion by everyone they come into contact with. Research has explored the relational aspects of care, which affects how people feel they are treated. In particular, research has found that the extent to which people *feel* cared for affects their satisfaction with support (Gärtner *et al.*, 2010; National Nursing Research Unit, 2013b; Ogbonnaya and Daniels, 2017). Evidence from clinical studies shows that anxiety and fear delay healing (Cole-King and Harding, 2001; Weinman *et al.*,

2008). Good communication with end-users has been found to contribute positively to wellbeing, and also hastens recovery (Suchman *et al.*, 1993; Shuldham, 1999). More recent work, on the power dynamics of providing care, has emphasised the importance of nursing practice based on the principles of patient-centred care, and its potential impact on levels of safety within hospitals: if nurses and patient are able to work together to identify the care needed, the result can be more positive (Kagan, 2014).

However, burnout is a widespread problem among emergency front-line workers, and this may prevent them from seeing the *person* in the end-user. Extensive research has covered the effects of burnout on medical professionals; it has been associated with suboptimal patient care practices (Shanafelt *et al.*, 2002), medical errors (West *et al.*, 2006) and reduced empathy (Thomas *et al.*, 2007). Burnout may also exacerbate the incidence of depersonalised care which is contrary to the front-line worker's intention of providing a patient-centred approach where end-users are accorded dignity and respect as individuals (Goodrich and Cornwell, 2008). Studies have shown that junior doctors (referred to as residents in the US study) who experienced burnout were significantly more likely to self-report suboptimal patient care (for example: *"I did not fully discuss treatment options or answer a patient's questions."* or *"I made . . . errors that were not due to a lack of knowledge or inexperience."*) (Shanafelt *et al.*, 2002). Feelings of burnout and compassion fatigue have also been found to exacerbate the poor treatment of patients with mental health problems, and reduce their chance of a person-centred approach to treatment (Knaak, Mantler and Szeto, 2017).

Furthermore, the cumulative effect of delivering sub-optimal work can contribute to depersonalisation. Dr Jocelyn Cornwell of The King's Fund commenting in the *Nursing Standard* states that: *'Many nurses feel under enormous work pressure, but also feel they are not delivering the care they would like and are letting people down. If that goes on for an extended period, and there is no way of thinking or talking about it, it can be destructive. It leads to people shutting off and depersonalising patients.'* (Dean, 2011).

For those working in blue light services, the risk of depersonalisation of end-users could have an impact on those using services. High numbers of end-users who use blue light services have experience of poor mental health (Mind, 2016a; Marsh, 2017) and encountering a member of staff who does not have the capacity to offer person-centred care could result in a reduced quality of service.

Impact of reducing stigma and increasing awareness of mental health

In addition to suffering from mental health problems caused by work-related stresses, staff also often experience self-stigma and stigma. Evidence suggests that front-line workers usually do not believe they are able to disclose their mental health problems and avoid treatment due to fear of stigma and prejudice (Rüsch, Angermeyer and Corrigan, 2005).

According to Mind's Blue Light Programme, emergency workers (blue light personnel) are generally less comfortable talking about mental health than the general population (Mind, 2015). Nearly 40% reported that they would not be comfortable talking about their mental health to friends and family and three quarters would not be comfortable talking to an employer. Only 57% said they are 'very likely/quite likely' to consult a doctor. This is significantly lower than the general population, 82% of whom said in 2012 that they would be 'very likely' or 'quite likely' to consult a GP about a mental health problem (Mind and Future Thinking, 2015).

The relationship of staff with their managers or employers impacts highly on wellbeing. A report on firefighters found that in addition to the traumatic nature of their work in the fire and rescue service, the most commonly reported causes of workplace stress were the excessive demands and perceived lack of support of senior managers; which included poor consultation and lack of training (Moffitt, Bostock and Cave, 2014; Mind, 2016a). Due to the experience of working in this type of organisational culture, many believed that revealing a mental illness or seeking support would impact on them negatively. A report from the Department for Communities and Local Government (2008) suggests, for example, that the 'fire fighter image' could influence their willingness to seek help for stress and mental health problems. A survey of firefighters suggests that being "emotionally strong" and "being brave" are seen as important traits in a fire fighter (Moffitt, Bostock and Cave, 2014). Similarly, police officers report that stigma attached to mental illness prevents them from disclosing their problems to their managers. They fear being ridiculed or perceived as incompetent and not up to the job, and that their career would be affected (Mind, 2016a; Police Dependants' Trust, 2016).

Mind's scoping research to expand the Blue Light Programme to 'new recruits' found those from the younger generations (for example, in their first years of work) to be self-aware around issues of mental health, though they perceived others with more work experience within the services as being less likely to be open. They demonstrated relatively high levels of self-awareness around mental health but were aware that stigma still exists within their organisations, particularly amongst longer-serving personnel (Research Ability, 2017). Many of those surveyed claimed that they would be reluctant to disclose personal experiences of mental health at work, due to a fear of being judged by colleagues, or because it might have a negative impact on their career.

Evidence shows that providing training in mental health awareness in the workplace is helpful in reducing stigma and also in changing people's attitudes. One report evaluated the impact of three mental health interventions on knowledge of and attitudes towards mental health in fire service managers. Participants showed increased knowledge in relation to how to recognise signs of stress, and attitudes shifted towards 'becoming more tolerant, hopeful, compassionate and less judgmental' (Moffitt, Bostock and Cave, 2014, p. 110). The evaluation of training for managers found that they had a greater appreciation of the

prevalence of issues, as well as increased confidence in recognising the signs and symptoms of mental health problems, and starting a conversation about these (Wilson *et al.*, 2016). Similarly, brief educational courses on mental illness were proved to reduce stigmatising attitudes among a wide variety of participants (such as police officers, industrial workers and government employees, and high school students) (Rüsch, Angermeyer and Corrigan, 2005).

A study in Australia investigated the effect of mental health training on managers' knowledge, attitudes and confidence; including their behaviour towards employees with mental health problems, and their understanding of its effect on employee sickness absence. During the 6-month follow-up, the mean rate of work-related sick leave decreased in the intervention group and increased in the control group. The study found that taking part in a mental health training programme could lead to a significant reduction in work-related sickness absence, with an associated return-on-investment of \$9.98 for each pound spent on such training (Milligan-Saville *et al.*, 2017). Such improvements can impact on the availability of staff from blue light services being able to deliver their services and support members of the public.

There have been some positive findings about the impact of anti-stigma initiatives through Mind's Blue Light Programme (Mind, 2016b). There has been a significant positive impact on Blue Light Champions themselves: they reported increased confidence in talking about their own and others' mental health, empowerment to support others and a reduction in reported poor mental health (from 13% saying that they had 'poor to moderate' mental health in the pre-survey, to just 5% in the post-survey). The research therefore suggests that reducing stigma and providing workplace training for all, including managers, is a necessary first step towards ensuring that staff are given the space to share their problems, recognise and address their mental health issues, and also to seek treatment and support – without fear of prejudice or punishment.

While none of the research presented above provides a direct link to potential end-user impacts, inferences can be drawn from the findings. Reducing stigma, leading to appropriate support being made accessible, can ensure that the workforce is able to be present and fit for work. This can have direct implications for the public in that (more) staff will be available to support them. Furthermore, if staff experience increased tolerance and levels of compassion, these outcomes could convert into interactions with their peers, as well as with the end-users of their services.

Impact of increased wellbeing for emergency front-line workers

Developing resilience can help people to manage and adapt to stressful situations. Resilience can be viewed as a defence mechanism, which enables people to thrive in the face of adversity (Davydov *et al.*, 2010) and can help people manage and maintain stable mental

wellbeing. Building resilience can be critical for emergency front-line workers who, when compared to the general population, report higher levels of mental health problems (Mind, 2016a). Resilience can be categorised in a number of ways, often incorporating three components: psychological factors such as adaptive coping styles; social factors such as having social support; and our overall wellbeing (Wild, 2016). These are summarised in Mind's model of resilience as: ways to cope, social connections, and wellbeing (Mind, 2018).

Focussing on positive behaviour such as adaptive coping skills, having social support and avoiding negative behaviour such as rumination (replaying a bad situation or thoughts) can help to protect emergency workers from developing mental health problems. Wild (2016) suggests that resilience interventions must include, as a core goal, an emphasis on reducing negative behaviours that are known to increase the risk of mental health problems. The Blue Light Programme activities encourage staff to recount their own experience of mental health issues, to both support and increase their peers' understanding of mental health and the approaches they use to stay well (Mind, 2016a; Wilson *et al.*, 2016).

It is important to note that initiatives aimed at changing people's attitudes are contributing factors (alongside structural issues such as workload) toward improving the mental health and wellbeing of emergency front-line workers which, as a result, can better the outcomes for end-users. It is therefore important to address and reassess the system's flaws, and minimise workload and stress among emergency front-line workers, for a better end-user experience. Increasing wellbeing for emergency workers through changing workplace culture, providing flexible hours, increasing training and reducing workload, all have to go hand-in-hand with raising awareness about mental health (Mind, 2016a).

According to the Police Dependents' Trust (2016), police officers suggested that in addition to increasing their levels of training, and having the opportunity to talk about issues that might be affecting them, it was also important to consider the possibility of limiting the tenure of particular roles (such as the investigation of child sexual exploitation); this would attempt to minimise the impact of the work on individuals. In general, participants indicated that better support around mental health needs, as well as faster and better access to treatment and rehabilitation services, were high priorities. Additionally, they stated that factors such as reduced job security and changes within the organisation, due to the impact of austerity, were rated as having the greatest impact on wellbeing. As such these factors should also be addressed, to improve staff mental health. This is consistent with the findings across Mind's Blue Light Programme research to date (Mind and Future Thinking, 2015; Mind, 2016a, 2016b).

Staff understand the concept of good care, but due to the conditions in which they work, combined with burnout and depersonalisation, the quality of that care is being compromised. Developing and implementing intervention programs, that allow staff to better cope with the demands of their role, may produce a variety of beneficial effects not only for staff but also for end-users: by increasing the quality of care that they receive

(Poghosyan *et al.*, 2010). In addition to raising awareness, the cultivation of a work environment that is built on trust provides a sense of control and belonging, which contributes towards a greater feeling of job satisfaction and being supported at work (Ogbonnaya and Daniels, 2017). These factors are known to contribute to the improvement of staff wellbeing, *'the evidence on the association between positive social interaction at work and well-being shows a strong connection, consistent with evidence in the broader well-being literature, of the importance of good social relationships to wellbeing'* (Jeffrey *et al.*, 2014, p. 37).

A focus on staff resilience provides a framework for creating both policies and procedures, as well as delivering individual support that can help staff to recover, following challenging experiences in their work or a period of mental ill health. This framework should, in turn, reduce staff absenteeism and presenteeism and encourage an increased attendance that will result in more staff being available to support members of the public. This ultimately affects the end-users' experience as they encounter a workforce that is healthy and able to support people, including those in crisis. As well as increasing their presence, staff who are able to manage their wellbeing should be better able to deliver positive interactions with end-users, which should also contribute to an improved end-user experience.

Reflections

The existing literature highlighted an emerging understanding of the relationship between staff wellbeing, their functioning and end-users' care. It has identified emergency front-line workers as being under immense pressure in their workplace. They are working in demanding occupations, where end-users require high levels of support, but emergency workers can become overworked and stressed, and as a result may suffer from burnout and emotional exhaustion. The literature also highlights that they may be attending work when they are unfit to do so, which has a negative impact on staff wellbeing and may result in staff not being able to support end-users to the best of their ability.

Poor mental health among emergency workers is harmful to each individual, and could also impact on the way in which they function at work. Emergency workers who have been exposed frequently to traumatic incidents, and who are overworked and stressed, can expect their experiences to have an adverse impact on both themselves and end-users. As the literature points out, burnt-out staff are more likely to make mistakes, potentially risking harm to end-users. Addressing burnout via depersonalisation of the end-user is problematic as it clashes fundamentally with ensuring that the end-user is seen as *a person* and accorded dignity and respect. Being treated in a depersonalised way may also impact an end-user's recovery process.

The Blue Light Programme is one component of a broader strategy and operational investment within emergency services designed to support a better experience for both emergency front-line workers and end-users. Programmes, such as Blue Light, which provide support aimed at reducing stigma, raising awareness about mental health and

offering mechanisms for staff to manage their mental health, all contribute to minimising the potential impacts outlined in this chapter. These initiatives sit alongside wider system changes being implemented in services nationally, and also at a local level, such as through the Crisis Concordat (Crisis Care Concordat, 2018). These changes focus on how the system can better support people in crisis, and the processes and agencies that need to be in place to offer high quality support to the public.

4. Emergent Theory of Change

Introduction

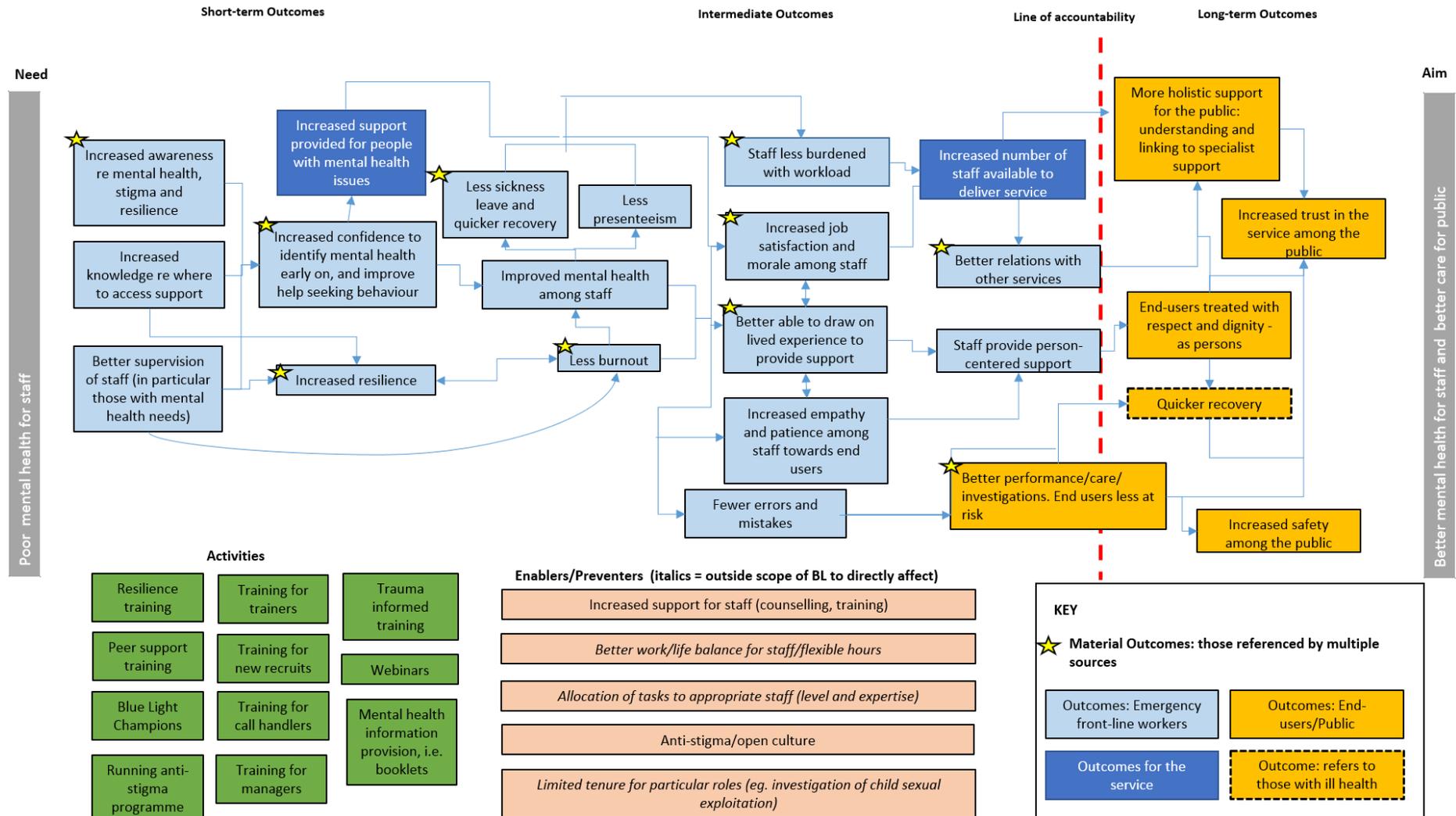
A Theory of Change (ToC) is a way of thinking about how a programme may lead to outcomes and goals. Theories of change describe the changes you want to make, the steps involved in making those changes, the assumptions underpinning those changes and how the changes relate to each other.

The starting point of any ToC is to establish 'need(s)': these are the un-met needs of the target population that the organisation is seeking to address through its stated aim. Once established, the process by which the un-met need(s) will be met is articulated through a series of outcomes from long-term to intermediate (variously referred to as short-term or medium-term outcomes or pre-conditions). Underpinning these changes are the various activities of the organisation, and the key assumptions that underpin why these activities are expected to result in the outcomes.

In addition to the activities of the organisation, a ToC recognises that outcomes do not occur in isolation and are contingent on external conditions (known as 'enablers' and 'barriers'). These are external social, economic and/or environmental issues, which influence the likelihood of achieving the 'aim'. The final 'line of accountability' acknowledges the point past which an organisation is no longer responsible for the achievement of outcomes.

The Theory of Change for the Blue Light Programme is illustrated in Figure 2.

Figure 2: Theory of Change diagram



The need and aim

Mind's research found that nine out of ten emergency service staff and volunteers in England had experienced stress and poor mental health at some point in their career (Mind, 2016a). As a result of this, Mind introduced the Blue Light Programme in 2015, with the aim of tackling stigma and discrimination, while embedding workplace wellbeing, increasing resilience, providing advice and support and improving pathways to services. In the years since then, the annual evaluations have shown largely positive results in relation to the aims of improving the mental health of staff, as well as tackling the culture of stigma surrounding mental health.

This piece of research goes further than existing research into trying to determine the broader impact of the Blue Light Programme on members of the public. The Theory of Change presupposes that there are positive impacts on the public, as a result of the programme providing emergency service personnel with support for their own mental health and wellbeing. The theoretical consequences for the wider public with whom the emergency service personnel interact are therefore illustrated in the ToC.

Activities

The Blue Light Programme's activities have multiple aims; a number of them contribute to achieving the short-term outcomes of increasing knowledge about mental health, while others, in addition to realising short-term outcomes, also create the conditions for achieving longer-term outcomes of changing culture, improving mental health for staff, and potentially leading to the provision of care for the public.

The activities include raising awareness about mental health by offering webinars to emergency workers, together with a wide range of literature about mental health problems and ways to look after one's mental health at work. Specific training for managers is provided to ensure they are better able to supervise and support their employees, while addressing elements of workplace culture that can contribute to poor mental health. Training for call handlers and new recruits has been introduced, with the aim of increasing their understanding of mental health and preparing them for some of the specific pressures associated with their roles. Additionally, the Blue Light Programme offers a four-week course focused on building resilience and sharing coping mechanisms, specifically designed for blue light emergency workers. Finally, the programme offers emergency workers a broad anti-stigma programme (delivered through a network of Blue Light Champions and employers, who have signed the Time to Change Pledge) with the aim of tackling the taboo culture that surrounds mental health.

Outcomes

The Blue Light Programme is ongoing and, as such, some of the outcomes outlined below are based on evaluations of the programme published to date, or are perceptions of possible outcomes, taken from the literature review and interviews with blue light staff.

Short-term outcomes

Past evaluations of the programme have found positive results when measured against the short-term outcomes outlined in Figure 2.

Participants reported they have increased their awareness of mental health issues and have a better understanding of the negative impact of stigma in their workplace, as a result of the interventions provided by the programme. The Phase 1 evaluation of the programme found that 92% of Pledge leaders (those who have signed the Time to Change Pledge) and 31% of employees felt that there had been an increase in awareness about mental health among staff members, as a result of the programme. Furthermore, 45% of employees thought that the stigma related to mental health and discrimination had decreased, when compared to the previous year (Mind, 2016b).

In addition, 61% of the Blue Light Champions (compared to 43% in the pre-survey) reported an increased confidence among staff to communicate about mental health: an increase of 18% one year after participating in the programme. However, employees in general were less positive, with 46% stating they had experienced increased confidence to disclose their needs and seek support. Just over a third of employees agreed that they felt their organisation supported them with their mental health needs, compared to 83% among Pledge leads (Mind, 2016b). These emerging findings highlight the different speeds at which short-term change is achieved within blue light organisations; therefore one consideration that needs to be borne in mind, when evaluating any subsequent outcomes, is the extent to which these short-term outcomes have been achieved across different staff groups.

A further, anticipated, short-term outcome is, 'better supervision of staff by managers'. In the Phase 1 evaluation, the managers who participated in the face-to-face training, reported a significant increase in their understanding of mental health problems, as well as in their understanding of the prevalence of these problems in their workplace (Mind, 2016b). They also reported an increase in their ability to identify the signs and symptoms of common mental health conditions (Mind, 2016b). These immediate, positive, changes indicate that managers who participate in the Blue Light Programme activities are better able to support and supervise their staff.

"There are so many people with issues and they can't talk about them. [We] need to think about how to supervise differently." [Participant, Police]

However, discussions with Blue Light Programme participants revealed that staff still encounter difficulties around having open and honest conversations about mental health

within their workplaces. One participant from the police force stated that training for managers is key in changing culture as: “[a] significant number of [staff] that are partially unwell is as the result of the way that they are dealt with by management.” Another shared that training supervisors or managers would create a wide-ranging impact as: “one [manager] reaches more...they can have a bigger impact on whole shifts.”

Despite this, participants in the programme were positive that people are becoming more aware of mental health issues, with one interviewee reporting that their new chief constable had already ear marked £100,000 for the division, for improving wellbeing. The participant stated: “when people are not well it’s hard to get out of a hole and it’s nice to know that there is a system [in place to support them].” This illustrates the importance of management accessing training as well as the need for wider changes within organisations, such as expansion of wellbeing provision, to facilitate outcomes experienced by individuals.

Although research suggests that there may be a long way to go in order to develop an open culture in relation to mental health, there are initial indications of a growth in confidence among staff, as well as increased awareness of mental health issues, among managers. It is hoped that these indicators will influence a change in culture that will expedite further developments. In addition, it is hoped that the provision of appropriate and accessible support for mental health, a commitment to increasing resilience, and the provision of education around coping strategies for emergency services staff, will further contribute to broader cultural changes in the long-term that would facilitate ongoing conversations.

Intermediate outcomes

The Blue Light Programme is ongoing and, as such, evidence is still being gathered in relation to all the changes participants are experiencing. The intermediate outcomes outlined in the Theory of Change are therefore anticipated outcomes, which have been formulated on the basis of the findings from the literature review and conversations with those involved in Blue Light Programme activities.

The short-term outcomes drive the intermediate outcomes; as a result of increased confidence and knowledge among staff as well as the better support provided by managers and their organisations, it is expected that staff will benefit from improved mental health. Furthermore, it is anticipated that line managers will be better able to monitor staff stress levels and responses to their work environment, enabling managers to understand when to provide good and timely support. An interviewee from the police stated that over 6000 people in their force have disclosed their mental health problems, but added: “this is just the tip of the iceberg... I could add another 20 people to the list of people I engage with on a daily basis with severe mental health issues”. The interviewee further added that there is a real problem with presenteeism and there are many who are: “far from well, teetering on the edge”. Timely identification and access to support could lead to staff experiencing less burnout. Less burnout amongst staff has been found to contribute directly towards further improving

mental health (Bakker and Heuven, 2006; Poghosyan *et al.*, 2010; Prinz *et al.*, 2012). It is anticipated this would then lead to less sickness leave and less presenteeism among staff.

Discussions with participants, both in interviews and in workshops, indicated that this outcome – the increased presence of healthy staff – is the most important outcome for the public: the one that would have the greatest impact on their experience of blue light services. Indeed, for many of those interviewed, imagining or articulating further outcomes for end-users proved to be difficult; perhaps reflecting the priorities for each of these services in dealing with current service issues.

The majority of those interviewed stated that the provision of better support for staff would lead inevitably to more staff being available to support the public. One interviewee who has been in the police force over 30 years stated that supporting staff is essential: *“it’s about looking after themselves before they look after everyone else.”* Providing support means: *“[staff] will be able to cope with incidents better and as a result attend work which means the public will be supported.”* Another interviewee from the police, who has been in the force for 16 years, stated: *“morale has never been so bad and this has a knock on effect in how [staff] deal with people...they [the public] pick up on that.”* In contrast, providing more support for staff could help to tackle this problem, and this would lead to positive impact for the public as they would have access to a more helpful, more resourced staff. This outcome was also reflected by representatives from the fire and rescue services.

Evidence shows that workplaces that provide good ‘people management’, such as by allowing staff to have input into decisions about their broader working environment, or encouraging staff to be respectful and supportive of each other, are more likely to enjoy increased wellbeing (Jeffrey *et al.*, 2014). Recent research has shown that NHS Trusts that use good people-management practices, are over twice as likely to have staff with the highest levels of job satisfaction, compared to NHS Trusts that made the least use of these practices. They were also over four times more likely to have the most satisfied patients, and over three times more likely to have the lowest levels of sickness absence (Ogbonnaya and Daniels, 2017). It is anticipated that the Blue Light Programme, combined with continual improvement in managers’ skills, might achieve similar results – enabling staff to experience increased job satisfaction and higher morale, and resulting in greater numbers of staff being available to deliver services. It is also anticipated that these outcomes may further lead to staff providing a better service to end-users.

“Staff should be in a position to exercise professional judgement and give the rationale for that judgement[s]. It has to be verifiable and they have to be able to justify the decision and be accountable. But they can offer a better response.”

[Participant, police]

Line of accountability

The line of accountability refers to the point at which an organisation is no longer responsible for the achievement of outcomes: their contribution to previous outcomes acts as an enabler or catalyst for later change. In this Theory of Change the line has been placed at the end of intermediate outcomes.

Mind's Blue Light Programme may contribute to longer-term outcomes beyond the line of accountability, however the ability of the Blue Light Programme to influence change becomes limited over time and the role of external factors, such as adequate funding for services, becomes more prominent. The placement of the line of accountability also indicates a framework, that marks where outcome measurement could be focused during data collection. The starred outcomes in the Theory of Change (Figure 2) indicate the potential outcomes that the Blue Light Programme could measure, to aid understanding of whether the programme is working towards its long term aims.

Long-term outcomes

The intermediate outcomes will drive long-term outcomes. By this stage, it is hoped that all the prior outcomes will be contributing to an environment where end-users are potentially accessing higher quality services due to increased resources, and where staff feel well in their work. Although there is conflicting evidence in this area, those working in blue light services expressed their perception that increased quality of service equated to preventing harm (Alexander and Klein, 2001; Bakker and Heuven, 2006; Poghosyan *et al.*, 2010; National Nursing Research Unit, 2013b; Ogbonnaya and Daniels, 2017). Interviewees felt that having more resources (as a result of less sick leave) and greater internal support for their wellbeing, would lead to more consistent performance in their work.

Furthermore, the increased availability of structures and processes created to support staff, to help them to manage mental health issues result from their work, could also lead to better responses towards members of the public. One interviewee, from the police force, stated that all staff tend to deal differently with traumatic incidents (such as infant death, sexual abuse and road accidents), depending on their personality and experience. They stated that providing more support for their mental health would mean ensuring staff are aware of "*operational trauma*" and become able to cope better with incidents so that: "*[the traumatic incidents] do not [affect] the success of a criminal investigation*". In short, they felt that increased knowledge and support would allow staff to be able to respond consistently to different work demands, regardless of the situation and their personal experience. In turn, this should lead to end-users experiencing increased consistency of care and, in some cases, a more situation-appropriate approach, in the hands of emergency service workers.

Some interviewees stated that staff experiencing mental health problems might not be suited to some elements of the work in front-line service. However, others felt that with adequate support, continuing with frontline service would enable staff to better understand and

respond to their own response to trauma and mental health problems. In turn, they might be able to provide a unique insight into mental health problems and draw on their own and others' lived experience, to provide support and empathy towards members of the public who are in distress. This could lead to emergency workers with personal experience of mental health problems being seen and used as an asset, better able to support the public by drawing on their own understanding. This could further lead to staff providing a more person-centred approach when dealing with members of the public experiencing mental health issues.

It is hoped that applying a person-centred approach, when handling cases or dealing with members of the public, will contribute to a culture where end-users or members of the public are treated with respect and dignity during every interaction with blue light services. Many of the participants in the research stated their commitment to treating members of the public as persons, while recognising that the system, at times, does not allow them to do this. Some felt that their workplace culture was too focused on process rather than the person; putting pressure on them to fit the person through the process irrespective of how inadequate this might be.

"People are more aware of people as individuals than as processes. It is a case of getting processes to fit around the person, not the person to fit through the process." [Participant, Police]

Some reflected on their inability to influence different elements of the process: whilst local changes may be implemented, there are also national-level policies and processes that are harder to influence, such as recommendations for conducting an arrest when someone is violent. Others shared stories of incidents where people appreciated being treated with dignity, despite their awareness of the challenges they presented to the staff. One police officer described how someone he had dealt with for committing crimes, on multiple occasions, had said: *"I've ruined lives but you treat me like a person."* Such experiences will depend on the local context and whether staff have prolonged or repeat encounters with end-users. In the context of the blue light services, a person-centred approach may lead to those members of the public who are experiencing distress (for example, as the result of a road accident) experiencing a quicker recovery, or being better able to deal with the distressing incidents they are experiencing. This helps to increase the level of trust between the public and emergency service personnel.

"The training sessions help people to deal with in-the-moment stress that can affect how they behave in certain incidents... want[s] people to think this is not a nice job but I will be able to handle it well, I'll be able to give a better service. It's really important because the behaviour can be picked up by [a] member of [the] public and it can change how they perceive the supports of the police."
[Participant, Police]

The final outcomes at this stage is an aspiration that the Blue Light Programme will help staff to develop better relations with other services. This has been demonstrated through the Blue Light Mental Health Pilot Networks which have been found to have fostered ‘effective cross service working’ (Mountford, 2017). On an organisational level, the outcomes ‘increased level of staff able to deliver service’, which results from less staff sickness, together with ‘staff developing better relations with other services’. This could lead ultimately to the public (particularly those experiencing mental health problems) receiving more holistic support; this again could feed into increasing the trust between end-users and the service. Emergency staff who were consulted stated that they often come into contact with other services; for example, both the police and paramedics can both be called upon to support someone experiencing mental health problems. Staff who have greater understanding of, and are more empathetic towards, the needs of end-users are hopeful they can develop better relations with other services, so that they are able to work together both strategically and operationally. In this way they will be able to provide quality care and a person-centred approach. Such an approach can lead to timely and appropriate support for those experiencing mental health problems.

Enablers and preventers

Enablers and preventers refer to the factors that influence whether outcomes are achieved. The following were identified by staff engaged with this research.

Increased support for staff and anti-stigma culture

In order for emergency services personnel to continue to experience these changes, ranging from short-term to long-term outcomes, certain conditions have to be met. Firstly, workplaces need to continue to tackle stigma and discrimination in relation to mental health, over and above the activities delivered through the Blue Light Programme. For example, in evaluating lines of communication for the provision of information, one of the findings was that such provision should reflect the structure of front-line work and be accessible 24 hours a day (BMG Research, 2016). This need was echoed by front-line practitioners, who stated that people may need to talk at a time that is appropriate for them: “that might be at 3am”; therefore those present at that time within the workplace need to be open to supporting people’s needs. Mental health problems are still stigmatised within the blue light community (Mind, 2016a), which prevents staff from seeking support and could lead to them developing more serious mental health problems. Research emerging from the Blue Light Programme to date shows significant improvements in knowledge and culture. However, the speed of change differs, depending on individuals’ level of engagement in the programme, and between different groups and roles. Organisations still have some way to go before every staff member is able to work in an environment that best promotes their mental wellbeing. Therefore, it is seen to be necessary for workplaces to continue to provide

support in the form of counselling, training and the distribution of up-to-date information for members of staff, in relation to supporting their mental health.

Flexible hours, allocation of adequate level of work and limited tenure for particular roles

Structural issues such as workload, a lack of work–life balance, and extended exposure to work often associated with trauma, may lead to staff experiencing stress and developing mental health problems (Mind, 2016a). As such, staff members may not be able to tackle the issues of burnout and stress on an individual level (as well as their associated impact of sick leave and presenteeism) through attending counselling or training courses. Our Theory of Change sets out the potential outcomes that could be achieved, whilst being mindful of some of the resource challenges faced by blue light services that contribute to poor mental health, which would need to be addressed, if intermediate or long-term outcomes are to be achieved sustainably. Workplace managers could consider accommodating flexible work arrangements to accommodate staff needs, as well as allocating appropriate levels of work and ensuring that timely support is available, to minimise exposure to and the impact of trauma on individuals. Those staff consulted as part of this research described how some structural changes were being implemented within the force, outside of blue light activities, such as using community psychiatric nurses in the control room to help with decision-making during operational responses. They also described an increase in support from other grades of staff when providing communication updates to members of the public, such as placing victim support units locally, not centrally. These were cited as ways in which to support blue light staff to feel they were playing an appropriate role in assisting members of the public, as part of a wider local response.

5. Approaches to measurement

Existing methodologies

The majority of studies that have been included in the literature review have examined the impact of the working environment and the mental health of front-line practitioners on their ability to function in the workplace. The methodologies of these studies vary, depending on the research questions and the purpose of the research. Some studies have made use of standardised measures such as Maslach Burnout Inventory (MBI), Cambridge Depersonalisation Scale (CDS-9), Hospital Anxiety and Depression Scale (HADS) (Bakker and Heuven, 2006; Prinz *et al.*, 2012; Johnson *et al.*, 2016). Other studies have used two stage questionnaires measuring perceptions of contributing factors to performance (Foster and Carr, 1995; Wright and Cropanzano, 2000; Shanafelt *et al.*, 2002; Weinman *et al.*, 2008; van Daalen *et al.*, 2009; National Nursing Research Unit, 2013b; Kok *et al.*, 2017). Additionally, a number of the studies have sought to gather data from patients on their perceptions of the support offered during treatment: this has taken the form of questionnaires (Suchman *et al.*, 1993; National Nursing Research Unit, 2013b).

In terms of qualitative data, direct observation of care given has been used in a number of studies set out in the literature review (Foster and Carr, 1995). Other studies have sought to gain deeper insight into perceptions of performance through interviews with staff, patients and managers (Foster and Carr, 1995; National Nursing Research Unit, 2013b) as well as the use of vignettes as a discussion tool to assess impact of end-users' behaviour (Johnson *et al.*, 2016) Furthermore, gaining a deeper understanding of not only what matters to the end-user, but how they experience it, has led to the suggestion of the use of participative approaches such as patient led-guided tours of a treatment environment, to give the end-user the space to describe their experiences and feelings (LaVela and Gallan, 2014).

Looking more broadly at research around end-user experiences of front-line services, there is an increasing use of qualitative methodologies to gain deep insight into how people experience care and support. For example, within healthcare, qualitative approaches have sought to understand how performance is perceived and assessed by practitioners (Farr and Cressey, 2015). Within nursing in particular, researchers are increasingly seeking to understand the intricacy of experiences through narrative processes, using those studies to create meaning through practitioners telling their own stories (Wang and Geale, 2015). By using such approaches to gather in-depth information about the experiences of a small number of people, researchers are able to create materials that not only contribute to the evidence base, but that can also be used by those that are subject of the research in their own reflective practice (Creswell, 2006).

Alternative approaches

Looking more widely across other fields of research, there are a number of approaches that may lend themselves well to gaining a deeper understanding of the impact on the public of the Blue Light Programme. These alternative approaches are outlined below, with reflections on the appropriateness of these approaches for the Blue Light Programme. These reflections have been informed by conversations with those involved in the programme.

Broadly, the methodologies outlined below fall into two approaches: observation of change; and self-reported change from stakeholders. This division reflects research conducted by the Health Foundation in 2013 that summarised over 300 empirical studies (de Silva, 2013). All the approaches outlined below are intended to gather data from end-users directly, with regards to their experience, unless explicitly stated. Each approach presented offers a way of viewing end-user experiences, and how different activities contribute to achieving the outcomes in the Theory of Change.

Self-reported change

Patient stories have been found to provide an effective method for both learning and improvement and also to inform co-design of activities and interventions (de Silva, 2013). A patient story is created through an in-depth review or interview about the person's experience of a healthcare (or other) service, which is then reviewed by staff, managers, users and their family and used as a trigger for shared conversations (Science Daily, 2014). The process is a way of ensuring that strategic and operational staff become aware of how end-users feel they were treated and provides a human-centred approach to data collection, by rooting data collection in direct experiences, expressed by those directly involved. This approach focuses on how data can aid learning and prioritise action to improve compassionate care. The mode of data collection can vary, depending on the service or audience; however, it does involve data collection with end-users in some form. For example, some services have used online forms or social media to gather people's self-reported stories of experience in a way that is meaningful for them. However, those using the stories must be mindful that such accounts do not represent all patient experience, and unless the mode of data collection includes the capture of demographic information, it is not possible to analyse the responses within a context. It is also time-consuming to design a process for data capture, as well as finding the resources that are needed for staff and end-users to come together to review the stories.

Across the NHS, surveys are used regularly, to capture insight into the process of support for different patient groups; for example, through the Friends and Family Test (National Institute of Health Research, no date) or through the use of postcards as a data collection tool: people are asked to write about what aspect of their experience has been the most important to them (de Silva, 2013). Such approaches have been refined in recent years to capture real-time findings and immediate feedback from end-users, in particular through

the use of electronic checkpoints within settings. Whilst such approaches allow for a breadth of data to be collected across different groups, they tend to focus on the administration of services, and provide insight into how to improve communication and administrative process, which can improve the impact on members of the public. However, they do not allow narratives to be captured, particularly those that may be more difficult to express – such as in a time of crisis, which can provide deeper insight into the impact of programmes such as the Blue Light Programme, on the public. In addition, such a wealth of quantifiable data about patients is collected, that there would need to be a clear process for designing, capturing and using such data on the impact of the work carried out by the Blue Light Programme; that is, to ensure that any subsequent feedback is used to improve how Blue Light Programme activities are used within the service (Coulter *et al.*, 2014).

Photovoice is an approach whereby people use photographs and captions to document how their experiences change over time (de Silva, 2013). A research question will be agreed between, for example, strategic and operational staff and end-users, for them to explore through the gathering and analysis of images (Hudon *et al.*, 2016). Once the photos are taken, each group might choose some images to share with the other so they can better understand their perceptions. This approach is often used as way to overcome barriers to gathering feedback, especially well-documented barriers such as literacy and age. It also provides a mechanism by which to overcome barriers to speaking freely; by enabling people to say the ‘unsayable’ or provide feedback unprompted (for example outside a set ‘question’) (Byrne *et al.*, 2018). The method has been found to be engaging to multiple groups, due to the novelty of the approach, as well as the possibility of becoming involved as part of a solution to an issue (de Silva, 2013). However, as with patients’ stories, the data cannot be generalised to apply to wider populations. There is also an implicit assumption that end-users are able to tell a coherent story about their experiences, which may not be the case for those accessing a service at a time of acute need.

Most Significant Change (MSC) is an iterative method that involves generating multiple accounts of change (stories), which have been experienced by a group of people (for example end-users of services) and then analysed using a structured process to decide which outcomes and accounts have the most significance (Davies and Dart, 2005). MSC was first used to evaluate an aid project in Bangladesh and has since been used widely in international development work. It is best used for learning purposes, rather than for accountability and understanding of how and when change comes about.

The process first asks different stakeholders to tell stories of their experience with emphasis on what has significantly changed for them since their engagement with an activity, and why they think it is significant. Secondly, it brings together strategic and operational stakeholders to review the stories and identify those which they feel are the most significant, and why. This process may be repeated across different departments and teams (reducing the overall list of stories) until those with the most responsibility for the work are asked to

make a final selection and then to communicate down through the other levels, and to external stakeholders, the reasons for their selection (Davies and Dart, 2005). It is one method that can form part of a wider impact evaluation, by contributing to an understanding of how people's experiences are both similar and different, and in what context, as well as what value different contributors place on those differing experiences. This process of prioritising can therefore inform the development of clearer indicators for future wider data collection (Wilder and Walpole, 2008; Limato *et al.*, 2018). However, due to the nature of the process, it also requires time, resource, and the skills to make sure the stories are used within the learning process in an appropriate way, particularly if applied in the context of those using Blue Light services.

Observational methods

One method that is widely used in research is observation in situ, by a researcher. There are a number of standardised approaches to observation of (person-centred) care, such as the Patient Care Experience Observation Exercise (Institute for Healthcare Improvement, 2014). This sets out a discrete number of approaches that a researcher can take to undertake an observation such as: 'sit with a patient to observe what they see. Identify an area or process and determine how you can observe with a patient as they experience care for one to two hours or through a cycle of care' or 'Take a tour of the facility with a team member pushing the researcher in a wheelchair in order to experience the facility's entrances, signage, waiting areas, registration or nursing stations, interactions, etc., from this vantage point.' (ibid.) In short, multiple approaches are set out, depending on the nature of the research question. The exercise is intended to gain insight into how people behave, particularly in complex settings. The data gathered is used to develop visual representations of end-user journeys, and their interactions with the culture and practices of the organisation. More specific approaches to gathering observational data are set out below.

Dementia Care Mapping (DCM) is an observational tool that is used to assess behaviours and record responses using 23 behaviour categories, as well as giving each person a mood and engagement score (Cole, Keating and Grant, 2015). The data is collected at three time points – before, during and after an activity – to capture change. DCM focuses on wellbeing and quality of life outcomes that are more difficult to capture, and small levels of change 'in the moment'. The results of such an exercise, whilst quantified, are localised and therefore hard to generalise outside of that particular context. Therefore, the approach is often combined with qualitative ethnographic research, through interviews and observation, as well as phenomenological data collection: whereby the researcher seeks to embody the experiences of a care-home user by seeking to mimic their experience in context. DCM has been used within evaluation of arts practice to replicate the ethos and process of the delivery methods, as it is centred on the person and the meaning of an experience for them, whilst recognising that they may not be able to verbalise their response.

The capture of data through new, increasingly accessible, technologies such as video recording allows for the collection of large volumes of data in multiple settings. One study used the footage of body cameras worn by police forces to analyse the attitudes and behaviours of front-line staff in different contexts (Voigt *et al.*, 2017). The research was focused on respect: the theories of power, politeness and social distance were used to define the linguistic features of how respect is shown in conversation (*ibid*). A sample of the recordings were used to study the ‘utterances’ within conversations and to quantitatively code the language using a Likert scale. The results of the coding of the small sample were turned into a predictive model that was applied to the whole dataset of videos. Such an approach to gathering and analysing data provides situational details of experience that can inform analysis, as well as in-the-moment experiences that, due to the routine nature of their collection, may reduce the chances of data recording processes affecting behaviour. However, the approach relies on there being appropriate approaches to ongoing recording within service delivery. This may work within some blue light services and not others (for example within the police but not for ambulance staff). In addition, there is a need for very clear conceptual understanding of the behaviour that is being coded, which may be informed by prior qualitative research, as well as the resources needed to complete each stage (such as time, money and skills).

Research design

In addition to the data collection approaches described above, *how* the data collection is designed and implemented is also an important factor to consider in any subsequent research design. Below are a number of principles that may be applied to the next phase of the research.

Coproduction of survey and interview tools: An outcome identified in the Theory of Change is that Blue Light Programme activities challenge staff to think about being person-centred in their approach to supporting the public (in particular those with mental health problems). In replicating such an ethos in any data collection, the methodology could focus on the creation of shared knowledge that both informs the delivery of services and also helps end-users to make sense of their own experience (Hudon *et al.*, 2016).

Action research: Another outcome for staff is that they have a better understanding of how to use their lived experience of mental health problems within their work. With that in mind, Action research may offer a framework for developing and testing appropriate data collection methods regarding the impact of the Blue Light Programme on the public, while also supporting staff in developing local knowledge that can better help the case for developing the programme in situ (Kanerva, Kivinen and Lammintakanen, 2017). This approach to developing practice wisdom may help to recruit blue light personnel into such research activities; as the research to date has highlighted, the high workload of blue light staff and requests for support may need to be clear on how it can enhance their practice.

Identifying staff behaviours: Actor–Network Theory (ANT) can provide a means of understanding complex interventions within a system (Bilodeau and Potvin, 2018). Such a concept focuses the design of data collection approaches to examine the ‘dynamic and recursive interactions’ within an intervention, such as the Blue Light Programme activities and the context of delivery, such as within a police force (ibid). Therefore, any data collection could be complemented by mapping the situational context, and the networks of people and processes that interact with the Blue Light Programme, as part of the preparatory stages of any research. This would allow deeper insight into the potential for the programme to influence and contribute to change, and show where limitations in the structures of blue light services and in Mind’s provision, can affect such achievements.

Proportionality to the Blue Light Programme activities: Most interactions that the public will have with blue light services will be short term, and may be in a moment of crisis. Therefore, any approach to gaining a deeper understanding of the phenomenon of impact on the public needs to consider firstly, whether front-line practitioners have experienced a change as a result of Blue Light Programme activities, and then whether such a change has had an impact on the member of the public within the time they were engaged with the practitioner. A multiple-stage approach may help with enhancing the knowledge of the assumed chain of events.

Sampling and recruitment: Although there are some elements common to Blue Light services (such as, they help citizens in time of crisis) the day-to-day experiences of both staff and end-users of each of the services differs, in nature and in structure. Therefore, any subsequent approach to gathering empirical data should seek to sample across all of the services, to gather more service-specific insight into how the impact of blue light activities on staff and structures can subsequently impact on members of the public. For example, the next phase of the research may consider a case study from each of the four services. To recruit people into any such evaluation, guidance should be sought from within the local participating area regarding approaches that have worked in the past, while also mapping how staff who are less engaged in the Blue Light Programme can be included in research.

Appropriateness of approaches

In follow-up interviews with participants from blue light services, interviewees reflected on both the outcomes and the potential data-collection approaches. The approaches outlined above were received positively, with the following themes identified as being important for any subsequent research.

Approaches to understanding the impact of the programme on performance could be assessed through internal data collection, using measures of mental and physical health and performance standards. This focused on the earlier outcomes for staff, not on public impact. However, as outlined in Chapter 3, staff engaged in this research felt that the most

important outcome for the public was a healthy and present workforce, so such data may provide insight into whether or not this was achieved.

There was a particular interest in the use of stories and the narrative approach, and their power to help staff learn from such insights: “We learn as people through stories.” [Police representative]. There was reflection that approaches such as patient stories provide an opportunity for an individual to explore their experiences and share subsequent learning. There was less enthusiasm with regard to the use of survey approaches: although there was acknowledgement of the breadth of data provided, staff felt they were sometimes onerous for those completing them. They were felt to be “two dimensional” (lacking insight into the depth of experiences) and disengaging.

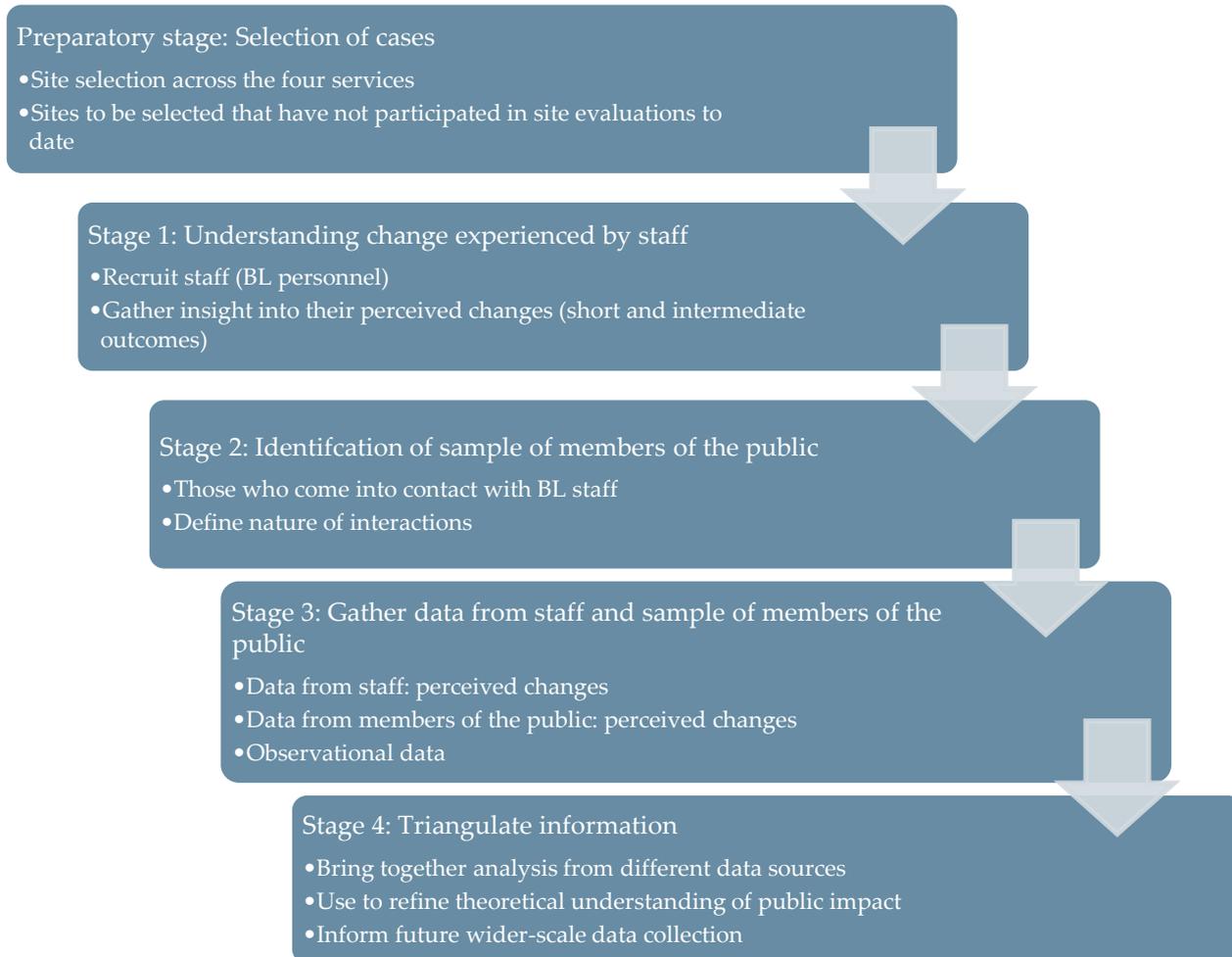
For representatives of services that capture on-going observational data (for example, via body cameras in the police), there was interest in the use of such data to inform future research. All staff felt that it would be straightforward to set up a research project to share data. Due to the normalisation of such a data-collection approach, there would be few cultural issues with regards to how staff feel, while knowing they are being observed. Other staff stated that data collection should reflect how services are delivered and, where possible, be part of on-going delivery, so they form a seamless approach rather than additions for small groups of people.

A number of those consulted described how the existing community engagement routes could be used as a means of engaging members of the public to gather insight, at a time when they are not in crisis. Representatives from the police explained how regular Police and Community Together (PACT) meetings offered an opportunity for meaningful dialogue with members of the community, and were a chance to explore complex subjects such as mental health. Such approaches might offer general insights that complement other more specific work with individuals.

Finally, staff reflected that whatever approach is implemented, it needs to be current and useful: there was a sense that lots of data is collected and, by the time it is published, it is out of date. Action-learning approaches may then provide a means of gathering and using data in a timely way.

A staged approach to gathering data

There are a number of challenges when gathering further insight and evidence into the impact of the Blue Light Programme on the public: the fleeting nature of interactions between staff and end-users; the emergent nature of the Theory of Change (based on extrapolating findings from other areas and staff perceptions); and the nature of the secondary impacts on the public. It is therefore proposed that the next stage of this research should be used to further develop the ToC and gather deeper insight into the impact of Blue Light Programme activities on the public. A summary of the proposed approach is set out in Figure 3, with further description provided below.

Figure 3: Proposed approach to data collection

Preparatory stage: Selection of cases

In order to gather insight across all blue light services, it is proposed that a case-based approach is taken across all four services, to gather in-depth data on what change is experienced by the public, and how activities contribute to such change. Therefore, it is suggested that four sites are selected, where data collection can take place – each representing one of the services. Both emergency services staff and members of the public are to gain deeper understanding of the extent to which the public experiences an impact, what type of impact is experienced, as well as what contributes to such impact, in that context.

Sites would need to be selected that have not yet taken part in any in-depth evaluation activities, in addition to those which have engaged in Blue Light Programme activities. During this preparatory stage, and following site selection, Mind staff and researchers would need to work with strategic and operational staff to build relationships and agree processes for each research stage. It is also an opportunity to reflect together on the research methodology, to ensure that learning from the site can inform local practice.

Stage 1: Understanding change for staff

As set out in the Theory of Change, there is an assumption that staff experience positive outcomes as a result of participating in Blue Light Programme activities and culture change within their organisations, and that these contribute to positive outcomes for members of the public. In order to best understand how the Blue Light Programme impacts members of the public, it will first be useful to understand what activities staff have participated in, and the resulting impacts, as well as any changes within the service as a result of programme activities (such as availability of information, or management processes).

The Blue Light Programme has published a number of pieces of research into the effects of the activities on staff (Mind and Future Thinking, 2015; Mind, 2016b; Wilson *et al.*, 2016; Research Ability, 2017). These evaluations set out the effects that information, support and learning activities have had on front-line staff and managers who participate in the programme. It is proposed that some of the data collection approaches, which gather insight into such changes, are used within consolidated surveys with staff, both before and after engagement with activities (in terms of knowledge and skills, and reported mental health). In addition, the survey could be used as an opt-in to further data collection around that person's work. For example, there may be a selection of opportunities they could opt into, such as personal reflections, or being observed; depending on service and site. In addition to gathering data on individual staff, it may also be useful to gather operational-level data on a sample of staff, both before and after taking part in Blue Light Programme activities (such as sickness levels), to provide a clear picture of the local context.

Stage 2: Identification of a sample of members of the public

Once an understanding of local activities and the impact on staff has been gathered, the next stage could involve working with a sample of interested staff within the case organisation, to co-design the next stage of data collection. One method could be to ask multiple representatives of staff from the sample to participate in a workshop, to co-produce descriptions of typologies of people who come into contact with service,² and how these interactions happen. The workshop could then explore how to use this information to define sites for data collection. Sites could include: calls to the control centre; first conversation with the person in situ; the resulting service delivery (in ambulance or police station); and follow-up communications from front-line or support staff. The definition of these sites would allow clarification of public, private and mixed spaces, which would inform what type of data collection could take place, and the relevant ethical and consent issues. For example, observation may be possible in a public place, but less welcome or appropriate somewhere deemed to be private: an ambulance team treating someone in the street is 'public' versus inside the ambulance, which is 'private'.

² In this case, the public could be the person directly 'accessing' the service or someone who comes with them (such as family member).

These typologies and the suggested approaches for each area would then need to be agreed with staff and managers of the sites of data collection.

Stage 3: Gather data from staff and members of the public

This stage would seek to gather data from multiple sources and perspectives, to develop a deeper understanding of what changes have happened, and how such changes link back to activities.

Data from staff could focus on their perception of changes in the way they deliver their work to members of the public; providing examples where possible, to bring such insight to life. It is proposed that a narrative approach could be used: embedded in debrief processes, or in regular meetings that allow for reflection. Such an approach could ask staff to reflect on how they have used their knowledge and skills in practice, and the impact for end-users as a result of this. By embedding such approaches (and mirroring such developments within services, to better embed activities to promote resilience), data could be collected on an ongoing basis. It could also be used as part of staff development, and to inform research activities.

Data from members of the public would focus on their perceptions of their experience: what happened during their interaction, how they felt, how this met their expectations of support provided by blue light services. This would follow the approach of patient stories, as set out above. This could be administered via an invitation to participate in research, given out by blue light personnel when someone is discharged or a case is closed; or through routine communications that are used by each service. The sample is likely to be limited to those who have something to share (whether positively or negatively); however, it would offer an opportunity to explore how people describe their experiences. As suggested above, such an approach could be hosted online, using short story prompts to elicit responses. This would allow end-users to contribute stories that have meaning to them, thereby creating a self-selecting sample that mirrors some of the structure of the most significant change (MSC) approach.

Where possible, it would also be useful to capture observational data, of public interactions between staff and end-users, so as to better understand whether information and support provided by the Blue Light Programme has resulted in any changes in behaviour. For example, in the police it would be possible to take a sample of footage via body camera. For other services, agreement on the number of sites or locations where data can be collected, would be needed. A protocol for what is being observed would need to be developed with the researchers, reflecting the outcomes outlined in the Theory of Change, and the reflections from staff in the co-design session regarding what such outcomes would look like. For example, if looking for empathetic behaviours when people are experiencing mental ill health or distress: what behaviours or language may be used and how should such behaviour be recorded?

Stage 4: Triangulate information

All the information gathered from staff, end-users and via observations, would lend itself well to an analysis of the outcomes and linkages set out in the Theory of Change, in order to update understanding of the potential impacts of the Blue Light Programme on the public. Bringing together a description of the local service and activities, and the changes for staff, would firstly set out the context for any contribution to impact on end-users. A further description of the impacts identified for members of the public would then aid better understanding of what does change, as well as the attribution of any blue light activities to these changes. Such an approach could refine theoretical understanding of public impact for each service, as well as informing future, wider-scale, data collection across a broader selection of sites.

The results from the triangulation of the data could be used for a final learning session with staff and management involved in the preparatory or co-design stages. This would allow for reflection on what has been learned and the impact on the Theory of Change for that area, as well as how such findings might inform further, wider-scale, data collection on the impact of (good) mental health of staff, on the performance of blue light services. Such rich data would also provide a welcome addition to the evidence base, around the public impact of such provision within front-line practice.

6. Conclusions

This exploratory research aims to provide an overview of what evidence exists for the potential impact on the public of Blue Light Programme activities, and recommends future research by which to expand this evidence base.

The process of undertaking this work revealed challenges in using existing research and evidence to inform such an approach, as well as in working with front-line staff to explore perceptions. As outlined in the literature review, evidence of the impact of good mental health in front-line staff on members of the public is scarce; in particular in the context of the potential positive impacts of using one's own experience of mental health to inform practice. Furthermore, the evidence that does exist is heavily weighted towards healthcare provision, with little insight into the personal experiences of, for example, firefighters.

Direct engagement with staff provided a number of insights into their experiences of learning more about mental health and how best to support themselves and others in the workplace. However, many staff found exploring the potential consequential effects for members of the public harder to articulate, apart from an awareness of benefits of the increased presence of healthy staff. When potential outcomes were described to participating staff, many agreed with the aspiration of providing a more person-centred approach. In particular they referenced how internal processes and support could offer such an approach, over and above their individual contribution. Finally, those engaged often described a local context that included many more activities than are delivered by the Blue Light Programme. This provided some concerns for future research, in unpicking the attribution of the activities to any subsequent impact on the public. In addition to the limitations already outlined, with regard to using extant evidence, it should also be noted that no ambulance staff participated in the research: all those engaged were from the police and the fire and rescue services. Therefore, any use of these emerging findings should be taken as informed by a number of the blue light services, but not all of them; and further data is needed to ensure that any findings are generalised across all services.

The resulting recommendation of using a multi-staged approach therefore provides one means of broadening the understanding of potential public impact, while remaining mindful of local conditions and activities that are being implemented, over and above the Blue Light Programme. The approach combines a number of data collection approaches that were well-received by front-line staff, as well as being a process that centralises learning for those within front-line practice. It focuses on developing deeper knowledge about what is happening in a small number of cases, in order to overcome some of the limitations outlined above, which could then inform future wider-scale work. However, as detailed above, for many blue light staff, the primary outcome for end-users is that more staff are well, and available within the service, to support them in a time of need. If this is the primary focus of

those working in blue light services, does a deeper and more insightful case need to be made as to the wider impacts?

For those working at Mind and within the blue light services, this report provides some insight that can deepen understanding of the evidence around the potential public impact of the Blue Light Programme. It can also provide a route for developing knowledge internally or in discussion with other research partners, that can inform decisions about the next steps in developing this work.

Appendices

Topic guide: Initial calls

Aims: These calls aim to gain a better understanding of how the Blue Light Programme's activities affect staff wellbeing, and what impact this has on their work with members of the public.

Verbal introduction: *Mind's Blue Light Programme is focused on the mental health and wellbeing of emergency services personnel. As well as evaluating the impact of activities on individuals, we also want to find out more about the impact that the wellbeing of individuals working in emergency services can have on the wider public with whom you interact. We want to explore your perceptions, as those with the closest experience, of what this impact could be. This is an area with very little research, so it is a great chance to help shape an understanding of what the subsequent effects of your participation in the Blue Light Programme activities can be.*

The call is being recorded; then from that recording I will make summary notes which I will store in a password protected file that only myself and one other researcher can access. We will summarise all of the findings, and that will be shared with Mind and partners. We might use quotes but these will be used with a pseudonym, and any identifiable data will be redacted.

Are you happy to continue the call? You can stop at any time and, if you don't want to answer any of the questions, that's okay.

Main questions:

- 1) Could you briefly describe the role you play in your organisation?
- 2) How have you been involved with the Blue Light Programme to date?
 - a) Prompt: workshops, activities, commissioning work
- 3) Can you describe what you hope the Blue Light Programme will achieve for you/ your staff?
 - a) What attitudinal or behavioural changes are you hoping to see?
 - b) Do you perceive there to be any policies or processes that might change in your organisation?
 - c) Are there any priorities for the staff in your organisation?
- 4) So, thinking about the outcomes that you have outlined; if these are achieved (list as examples), what could that mean for the way you/ the staff interact with the public?
 - a) What might change as a result of increased knowledge?
 - b) What might change in terms of communication?

- c) What might change in terms of relationships?
 - d) What might change in terms of (health, safety) outcomes?
 - e) Are there any negative outcomes we need to think about?
- 5) Are there particular things within your organisation that can affect the effectiveness of the Blue Light Programme in achieving the outcomes that we have discussed?
- a) What would you say needs to be in place to ensure that the Blue Light Programme activities can be embedded into practice?
- 6) Is there anything else you think it would be useful to tell me?
- 7) Are there other people, or organisational work, that you think we should consider as part of in this research?
- a) Can you provide names/ titles?

Topic guide: Follow-up calls

Aims: These follow-up calls will be used to sense-check the outcomes that have been identified through the Theory of Change, as well as the methods that are being explored as approaches to gaining a deeper understanding of impact.

Verbal introduction: *Thanks for taking the time to speak to us again. As you might remember in our last conversation, we explored how the Blue Light Programme is working in your area, and what outcomes you thought members of the public might experience as a result of this work. We also talked about other work that your organisation is doing to promote good mental health. All of the information and ideas people have shared with us have been summarised, along with some interesting findings that we found in a rapid literature review. We provided you with a short summary of the main ideas we had, via email, as well as some ideas we are exploring about how we could do some further research to better understand whether such outcomes are occurring. We just wanted to have a short conversation to get your perspective on these ideas, to inform our recommendations.*

This call isn't being recorded, but I will make summary notes that only myself and one other researcher can access. We'll then bring together all of the findings and prepare a short summary of all the interviews.

Are you happy to continue with the call? You can stop at any time and, if you don't want to answer any of the questions, that's okay.

Questions:

1. Firstly, looking at the outcomes. We sent you a document that contains five outcomes that members of the public could experience, identified by people we talked to and also through desktop research. What do you think about these outcomes? Which do

you feel strongly represents what could be achieved? Which do you feel are not quite right? Are there any ways we have described these outcomes that could be improved?

- a. *End users (with mental health issues) treated with dignity and respect.*
 - b. *More holistic support available for end users with mental health issues (as a result of increased understanding of mental health, how to better use staff's own lived experience of mental health, and providing links to specialist support).*
 - c. *Increased trust in the service amongst the public, particularly among those with mental health issues.*
 - d. *Quicker recovery (from ill-health) as a result of more appropriate support.*
 - e. *Better performance/ care/ investigations from service (as a result of less burnout of staff, and staff being able to draw on new knowledge and own lived experience).*
2. Secondly, we have set out some ideas about ways to measure whether these changes happen. Before we look at these, what ways do you currently use to measure your impact on the public? What works well about this approach? Less well?
 3. Now, thinking about these different methods, which of these did you feel might be applicable in your service? Why? Which ones do you feel less comfortable with and why?
 4. Finally, what are the most important things we need to think about if we are trying to collect data in your service setting?
 5. Any other thoughts or comments?

Thank you for your time.

References

- Alexander, D. A. and Klein, S. (2001) 'Ambulance personnel and critical incidents: Impact of accident and emergency work on mental health and emotional well-being', *British Journal of Psychiatry*, 178(Jan.), pp. 76–81. doi: 10.1192/bjp.178.1.76.
- Baird, K. and Kracen, A. C. (2006) 'Vicarious traumatization and secondary traumatic stress: A research synthesis', *Counselling Psychology Quarterly*. Routledge, 19(2), pp. 181–188. doi: 10.1080/09515070600811899.
- Bakker, A. B. and Heuven, E. (2006) 'Emotional dissonance, burnout, and in-role performance among nurses and police officers', *International Journal of Stress Management*, 13(4), pp. 423–440. doi: 10.1037/1072-5245.13.4.423.
- Bennett, P., Williams, Y., Page, N., Hood, K. and Woollard, M. (2004) 'Levels of mental health problems among UK emergency ambulance workers', *Emergency Medicine Journal*, 21(2), pp. 235–236. doi: 10.1136/emj.2003.005645.
- Bilodeau, A. and Potvin, L. (2018) 'Unpacking complexity in public health interventions with the Actor-Network Theory', *Health Promotion International*, pp. 173–181. doi: 10.1093/heapro/daw062.
- BMG Research (2016) *Blue Light Programme: Evaluation of the Information Provision strand*. Birmingham. Available at: <https://www.mind.org.uk/media/4627962/strand-4.pdf> (Accessed: 29 April 2018).
- Bonde, J. P. E. (2008) 'Psychosocial factors at work and risk of depression: a systematic review of the epidemiological evidence', *Occupational and Environmental Medicine*, 65(7), pp. 438–445. doi: 10.1136/oem.2007.038430.
- Boorman, S. et al (2009) *NHS health and well-being review*. London. Available at: http://webarchive.nationalarchives.gov.uk/20130103004910/http://www.dh.gov.uk/en/Publicationsandstatistics/Publications/PublicationsPolicyAndGuidance/DH_108799 (Accessed: 2 January 2018).
- Bride, B. E. (2007) 'Prevalence of secondary traumatic stress among social workers.', *Social work*, pp. 63–70. doi: 10.1037/0735-7028.30.4.386\n10.1177/1049731503254106\n10.1037/0735-7028.25.3.275.\n10.1111/j.1471-6402.1995.tb00278.x.
- Byrne, E., Elliott, E., Saltus, R. and Angharad, J. (2018) 'The creative turn in evidence for public health: Community and arts-based methodologies', in *Journal of Public Health*, pp. i24–i30. doi: 10.1093/pubmed/idx151.
- Cole-King, A. and Harding, K. G. (2001) 'Psychological factors and delayed healing in chronic wounds.', *Psychosomatic medicine*, 63(2), pp. 216–220. doi: 10.1097/00006842-200103000-00004.
- Cole, L., Keating, F. and Grant, R. (2015) *Reminiscence Arts and Dementia Care: Impact on Quality of Life, 2012-2015: A Final Report of the Evaluation*. London. Available at: <http://www.eyesociation.org/AgeExchange/RADIQL> Quantative Evaluation Final Report.pdf (Accessed: 9 April 2018).

- Coulter, A., Locock, L., Ziebland, S. and Calabrese, J. (2014) 'Collecting data on patient experience is not enough: they must be used to improve care', *BMJ*, 348, pp. g2225–g2225. doi: 10.1136/bmj.g2225.
- Creswell, J. W. (2006) 'Five qualitative approaches to inquiry', in *Qualitative Enquiry*. 2nd edn, pp. 53–84.
- Crisis Care Concordat (2018) *Mental Health Crisis Care Concordat*. Available at: <https://www.crisiscareconcordat.org.uk/> (Accessed: 29 April 2018).
- van Daalen, G., Willemsen, T. M., Sanders, K. and van Veldhoven, M. J. P. M. (2009) 'Emotional exhaustion and mental health problems among employees doing "people work": the impact of job demands, job resources and family-to-work conflict', *International Archives of Occupational and Environmental Health*, 82(3), pp. 291–303. doi: 10.1007/s00420-008-0334-0.
- Davies, R. and Dart, J. (2005) 'The "Most Significant Change" (MSC) Technique', *Change*, (April), pp. 1–104. doi: 10.1104/pp.110.159269.
- Davydov, D. M., Stewart, R., Ritchie, K. and Chaudieu, I. (2010) 'Resilience and mental health', *Clinical Psychology Review*, pp. 479–495. doi: 10.1016/j.cpr.2010.03.003.
- Dean, E. (2011) 'Building resilience', *Nursing Standard*, 26(32). Available at: <http://www.ctrtraining.co.uk/documents/BuildingResilience-NursingStandardArticle2012.pdf> (Accessed: 4 January 2018).
- Farmer, P. and Stevenson, D. (2017) *Thriving at work*. London. Available at: https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/658145/thriving-at-work-stevenson-farmer-review.pdf (Accessed: 2 January 2018).
- Farr, M. and Cressey, P. (2015) 'Understanding staff perspectives of quality in practice in healthcare', *BMC Health Services Research*. BioMed Central, 15(1), p. 123. doi: 10.1186/s12913-015-0788-1.
- Foster, J. and Carr, B. (1995) 'Depersonalisation of Patients in Intensive Care: Nurses' Meaning, Motives and Possible Benefits', *Australian Critical Care*, 8(2), p. 95.
- Garrow, V. (2016) *Presenteeism A review of current thinking*. Brighton. Available at: <https://www.employment-studies.co.uk/resource/presenteeism-review-current-thinking> (Accessed: 4 January 2018).
- Gärtner, F. R., Nieuwenhuijsen, K., van Dijk, F. J. H. and Sluiter, J. K. (2010) 'The impact of common mental disorders on the work functioning of nurses and allied health professionals: A systematic review', *International Journal of Nursing Studies*. Elsevier Ltd, 47(8), pp. 1047–1061. doi: 10.1016/j.ijnurstu.2010.03.013.
- Goodrich, J. and Cornwell, J. (2008) *Seeing the person in the patient - The Point of Care review paper, English*. The Kings Fund. Available at: www.kingsfund.org.uk/publications.
- Henderson, S. N., Van Hasselt, V. B., LeDuc, T. J. and Couwels, J. (2016) 'Firefighter suicide: Understanding cultural challenges for mental health professionals.', *Professional Psychology: Research and Practice*, 47(3), pp. 224–230. doi: 10.1037/pro0000072.
- Hudon, C., Loignon, C., Grabovschi, C., Bush, P., Lambert, M., Goulet, É., Boyer, S., De Laat, M. and Fournier, N. (2016) 'Medical education for equity in health: A participatory action research involving persons living in poverty and healthcare professionals', *BMC Medical*

Education, 16(1). doi: 10.1186/s12909-016-0630-4.

Institute for Healthcare Improvement (2014) *Patient Care Experience Observation Exercise*. Cambridge, Massachusetts: Institute for Healthcare Improvement. Available at: <http://www.ihl.org/resources/Pages/Tools/PatientCareExperienceObservationExercise.aspx> (Accessed: 9 April 2018).

Jeffrey, K., Mahony, S., Michaelson, J. and Abdallah, S. (2014) *Wellbeing at work: A review of the literature*. London. Available at: <http://neweconomics.org/2014/03/wellbeing-at-work/> (Accessed: 27 November 2017).

Johnson, H., Worthington, R., Gredecki, N. and Wilks-Riley, F. R. (2016) 'The relationship between trust in work colleagues, impact of boundary violations and burnout among staff within a forensic psychiatric service', *The Journal of Forensic Practice*, 18(1), pp. 64–75. doi: 10.1108/JFP-03-2015-0024.

Kagan, P. N. (2014) 'Power, empowerment, and change in nursing and health care', in Siarkowski Amer, K. (ed.) *Quality and Safety for Transformational Nursing: Core Competencies*. 1st edn. Pearson, pp. 70–97.

Kanerva, A., Kivinen, T. and Lammintakanen, J. (2017) 'Collaborating with nurse leaders to develop patient safety practices', *Leadership in Health Services*, 30(3), pp. 249–262. doi: 10.1108/LHS-05-2016-0022.

Knaak, S., Mantler, E. and Szeto, A. (2017) 'Mental illness-related stigma in healthcare', *Healthcare Management Forum*. SAGE PublicationsSage CA: Los Angeles, CA, 30(2), pp. 111–116. doi: 10.1177/0840470416679413.

Kok, A. A. L., Plaisier, I., Smit, J. H. and Penninx, B. W. J. H. (2017) 'The impact of conscientiousness, mastery, and work circumstances on subsequent absenteeism in employees with and without affective disorders', *BMC Psychology*. BMC Psychology, 5(1), pp. 1–10. doi: 10.1186/s40359-017-0179-y.

Kuykendall, L. and Tay, L. (2015) 'Employee subjective well-being and physiological functioning: An integrative model', *Health Psychology*. SAGE PublicationsSage UK: London, England, 2(1), pp. 1–11. doi: 10.1177/2055102915592090.

LaVela, S. L. and Gallan, A. S. (2014) 'Evaluation and measurement of patient experience', *Patient Experience Journal*, 1(1), pp. 28–36.

Limato, R., Ahmed, R., Magdalena, A., Nasir, S. and Kotvojs, F. (2018) 'Use of most significant change (MSC) technique to evaluate health promotion training of maternal community health workers in Cianjur district, Indonesia', *Evaluation and Program Planning*, 66, pp. 102–110. doi: 10.1016/j.evalprogplan.2017.10.011.

Madsen, I. E. H., Nyberg, S. T., Magnusson Hanson, L. L., Ferrie, J. E., Ahola, K., Alfredsson, L., Batty, G. D., Bjorner, J. B., Borritz, M., Burr, H., Chastang, J.-F., de Graaf, R., Dragano, N., Hamer, M., Jokela, M., Knutsson, A., Koskenvuo, M., Koskinen, A., Leineweber, C., Niedhammer, I., Nielsen, M. L., Nordin, M., Oksanen, T., Pejtersen, J. H., Pentti, J., Plaisier, I., Salo, P., Singh-Manoux, A., Suominen, S., ten Have, M., Theorell, T., Toppinen-Tanner, S., Vahtera, J., Väänänen, A., Westerholm, P. J. M., Westerlund, H., Fransson, E. I., Heikkilä, K., Virtanen, M., Rugulies, R., Kivimäki, M. and Consortium, for the I.-W. (2017) 'Job strain as a risk factor for clinical depression: systematic review and meta-analysis with additional

individual participant data', *Psychological Medicine*. Cambridge University Press, 47(08), pp. 1342–1356. doi: 10.1017/S003329171600355X.

Marsh, S. (2017) 'Ambulance call-outs for mental health patients in England soar by 23%', *The Guardian*, 13 August. Available at:

<https://www.theguardian.com/society/2017/aug/13/ambulance-call-outs-mental-health-patients-soar-23-per-cent> (Accessed: 5 January 2018).

McCann, L. and Pearlman, L. (1990) 'Vicarious traumatization: A framework for understanding the psychological effects of working with victims', *Journal of Traumatic Stress*, 3(1), pp. 131–149. doi: 10.1007/BF00975140.

Mental Health Foundation (2015) *Fundamental Facts About Mental Health*. London. Available at: <https://www.mentalhealth.org.uk/sites/default/files/fundamental-facts-15.pdf> (Accessed: 2 January 2018).

Mental Health Foundation (2017) *Mental health statistics: mental health at work, Statistics*. Available at: <https://www.mentalhealth.org.uk/statistics/mental-health-statistics-mental-health-work> (Accessed: 2 January 2018).

Mental Health Foundation (2018) *Stress, Stress: A-to-Z*. Available at: <https://www.mentalhealth.org.uk/a-to-z/s/stress> (Accessed: 24 April 2018).

Milligan-Saville, J. S., Tan, L., Gayed, A., Barnes, C., Madan, I., Dobson, M., Bryant, R. A., Christensen, H., Mykletun, A. and Harvey, S. B. (2017) 'Workplace mental health training for managers and its effect on sick leave in employees: a cluster randomised controlled trial', *The Lancet Psychiatry*, 4(11), pp. 850–858. doi: 10.1016/S2215-0366(17)30372-3.

Mind (2015) *Blue Light Scoping Survey*. London. Available at: <https://www.mind.org.uk/media/4627950/scoping-survey.pdf> (Accessed: 29 April 2018).

Mind (2016a) *Blue Light Programme Research Summary*. London. Available at: <https://www.mind.org.uk/media/4614222/blue-light-programme-research-summary.pdf> (Accessed: 4 January 2018).

Mind (2016b) *Blue Light Programme Strand 1 (Part 2)*. Available at: <https://www.mind.org.uk/media/4633705/strand-1-part-2.pdf> (Accessed: 2 January 2018).

Mind (2016c) 'One in four emergency services workers has thought about ending their lives'. London: Mind. Available at: <https://www.mind.org.uk/news-campaigns/news/one-in-four-emergency-services-workers-has-thought-about-ending-their-lives/#.WuYKBqQvzX6> (Accessed: 29 April 2018).

Mind (2018) *Resilience at Mind, Local Minds*. Available at: <https://www.mind.org.uk/about-us/local-minds/resilience> (Accessed: 29 April 2018).

Mind and Future Thinking (2015) *Blue Light Programme Strand 1 Evaluation (Part 1)*. Available at: <https://www.mind.org.uk/media/4627953/strand-1-part-1.pdf> (Accessed: 2 January 2018).

Moffitt, J., Bostock, J. and Cave, A. (2014) 'Promoting well-being and reducing stigma about mental health in the fire service', *Journal of Public Mental Health*, 13(2), pp. 103–113. doi: 10.1108/JPMH-02-2013-0004.

Mountford, S. (2017) *Blue Light Mental Health Networks: Pilot year evaluation report*. London. Available at: <https://www.mind.org.uk/media/15115538/blp-mental-health-network-pilot>

evaluation-report.pdf (Accessed: 29 April 2018).

National Institute of Health Research (no date) *Understanding data on patient experience of GP services, Health Services and Delivery Research*. National Institute of Health Research. Available at: <https://www.journalslibrary.nihr.ac.uk/downloads/research-programmes/HSDR/Understanding-patient-experience.pdf> (Accessed: 9 April 2018).

National Nursing Research Unit (2013a) *Does NHS staff wellbeing affect patient experience of care?* 39. London. Available at: <https://www.kcl.ac.uk/nursing/research/nnru/policy/Currentissue/Policy-Plus--Issue-39.pdf> (Accessed: 4 January 2018).

National Nursing Research Unit (2013b) *Does NHS staff wellbeing affect patient experience of care?* 39. London. Available at: <https://www.kcl.ac.uk/nursing/research/nnru/policy/Currentissue/Policy-Plus--Issue-39.pdf> (Accessed: 3 January 2018).

NHS Digital (2014) *Adult Psychiatric Morbidity Survey: Survey of Mental Health and Wellbeing, NHS Digital*. Available at: <https://digital.nhs.uk/data-and-information/publications/statistical/adult-psychiatric-morbidity-survey/adult-psychiatric-morbidity-survey-survey-of-mental-health-and-wellbeing-england-2014> (Accessed: 24 April 2018).

Ogbonnaya, C. and Daniels, K. (2017) *Good work, wellbeing and changes in performance outcomes*. London. Available at: <https://www.whatworkswellbeing.org/product/good-work-wellbeing-and-changes-in-performance-outcomes/> (Accessed: 2 March 2018).

Phelps, A., Lloyd, D., Creamer, M. and Forbes, D. (2009) 'Caring for carers in the aftermath of trauma', *Journal of Aggression, Maltreatment and Trauma*, 18(3), pp. 313–330. doi: 10.1080/10926770902835899.

Poghosyan, L., Clarke, S. P., Finlayson, M. and Aiken, L. H. (2010) 'Nurse burnout and quality of care: cross-national investigation in six countries.', *Research in nursing & health*, 33(4), pp. 288–298. doi: 10.1002/nur.20383.

Police Dependents' Trust (2016) *Supporting The Service: Police Injury On Duty Research Results 2016*. Available at: <https://www.pdtrust.org/wp-content/uploads/2016/11/PDT-Survey-Report-FINAL-VERSION-smalll.pdf> (Accessed: 2 January 2018).

Prinz, P., Hertrich, K., Hirschfelder, U. and de Zwaan, M. (2012) 'Burnout, depression and depersonalisation--psychological factors and coping strategies in dental and medical students.', *GMS Zeitschrift für medizinische Ausbildung*, 29(1), pp. 1–14. doi: 10.3205/zma000780.

Research Ability (2017) *Blue Light Programme - Phase Three. New Audience Scoping: New Recruits Final Report*. London.

Royal College of Nursing (2013) *Beyond breaking point? A survey report of RCN members on health, wellbeing and stress*. London. Available at: <https://www.rcn.org.uk/professional-development/publications/pub-004448> (Accessed: 2 January 2018).

Rüsch, N., Angermeyer, M. C. and Corrigan, P. W. (2005) 'Mental illness stigma: Concepts, consequences, and initiatives to reduce stigma', *European Psychiatry*, pp. 529–539. doi: 10.1016/j.eurpsy.2005.04.004.

Science Daily (2014) 'Patients' stories used to improve care on hospital wards', *Science Daily*, 5 March. Available at: <https://www.sciencedaily.com/releases/2014/03/140305111048.htm> (Accessed: 10 April 2018).

Shanafelt, T. D., Bradley, K. A., Wipf, J. E. and Back, A. L. (2002) 'Burnout and self-reported patient care in an internal medicine residency program', *Annals of Internal Medicine*, 136(5), pp. 358–367. doi: 10.7326/0003-4819-136-5-200203050-00008.

Shuldham, C. (1999) 'A review of the impact of pre-operative education on recovery from surgery.', *International Journal of Nursing Studies*, 36(2), pp. 171–7.

de Silva, D. (2013) *Measuring patient experience*, The Health Foundation. doi: 10.7748/nr2011.10.19.1.25.c8768.

Sterud, T., Ekeberg, Ø. and Hem, E. (2006) 'Health status in the ambulance services: a systematic review.', *BMC health services research*. BioMed Central, 6, p. 82. doi: 10.1186/1472-6963-6-82.

Suchman, A. L., Roter, D., Green, M. and Lipkin Jr, M. (1993) 'Physician satisfaction with primary care office visits. Collaborative Study Group of the American Academy on Physician and Patient', *Medical care*, 31(12), pp. 1083–1092.

Thomas, M. R., Dyrbye, L. N., Huntington, J. L., Lawson, K. L., Novotny, P. J., Sloan, J. A. and Shanafelt, T. D. (2007) 'How do distress and well-being relate to medical student empathy? A multicenter study', *Journal of General Internal Medicine*, 22(2), pp. 177–183. doi: 10.1007/s11606-006-0039-6.

Thompson, S. and Marks, N. (2008) *Measuring well-being in policy: issues and applications*. London. Available at: https://b3cdn.net/nefoundation/575659b4f333001669_ohm6iiogp.pdf (Accessed: 17 July 2018).

Voigt, R., Camp, N. P., Prabhakaran, V., Hamilton, W. L., Hetey, R. C., Griffiths, C. M., Jurgens, D., Jurafsky, D. and Eberhardt, J. L. (2017) 'Language from police body camera footage shows racial disparities in officer respect', *Proceedings of the National Academy of Sciences*, 114(25), pp. 6521–6526. doi: 10.1073/pnas.1702413114.

Wang, C. C. and Geale, S. K. (2015) 'The power of story: Narrative inquiry as a methodology in nursing research', *International Journal of Nursing Sciences*. Elsevier, 2(2), pp. 195–198. doi: 10.1016/J.IJNSS.2015.04.014.

Weinman, J., Ebrecht, M., Scott, S., Walburn, J. and Dyson, M. (2008) 'Enhanced wound healing after emotional disclosure intervention', *British Journal of Health Psychology*, 13(1), pp. 95–102. doi: 10.1348/135910707X251207.

West, C. P., Dyrbye, L. N., Sloan, J. A. and Shanafelt, T. D. (2009) 'Single item measures of emotional exhaustion and depersonalization are useful for assessing burnout in medical professionals', *Journal of General Internal Medicine*, 24(12), pp. 1318–1321. doi: 10.1007/s11606-009-1129-z.

West, C. P., Huschka, M. M., Novotny, P. J., Sloan, J. A., Kolars, J. C., Habermann, T. M. and Shanafelt, T. D. (2006) 'Association of perceived medical errors with resident distress and empathy: A prospective longitudinal study', *Journal of the American Medical Association*, 296(9), pp. 1071–1078. doi: 10.1001/jama.296.9.1071.

- Wild, J. (2016) *The effectiveness of resilience interventions for emergency workers, older adults and young people: Review and Recommendations*. Oxford.
- Wilder, L. and Walpole, M. (2008) 'Measuring social impacts in conservation: Experience of using the Most Significant Change method', *ORYX*, pp. 529–538. doi: 10.1017/S0030605307000671.
- Wilson, S., Sinclair, A., Huxley, C. and Spiegelhalter, K. (2016) *Evaluation of Mind's Blue Light Programme Strand 2: Workplace Wellbeing*. Brighton. Available at: <https://www.mind.org.uk/media/4627956/strand-2.pdf> (Accessed: 29 April 2018).
- Wright, T. A. and Cropanzano, R. (2000) 'Psychological well-being and job satisfaction as predictors of job performance.', *Journal of Occupational Health Psychology*, 5(1), pp. 84–94. doi: 10.1037/1076-8998.5.1.84.