



**Mental Health Crisis Training for Non-mental Health Professionals**

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## Mental Health Crisis Training for Non-mental Health Professionals

### *Purpose*

This study evaluates a training in Mental Health Crisis Support for Non-Mental Health Professionals who work in urgent care settings. The training consists of an e-learning module, a one-day face to face (F2F) interactive study day and simulation training.

### *Design*

This ~~mixed~~multi-methods study collected data pre and post training and at three to six months post training. Validated questionnaires, rating scales and open-ended questions were used to measure self-efficacy in healthcare skills, attitudes towards mental illness, and knowledge and confidence in working in mental health. A subsample of participants was interviewed post training about how they had used the knowledge and skills learned.

### *Findings*

~~706~~ Seven hundred and six staff completed the e-learning, 88 attended the F2F training and 203 attended simulation training. Overall satisfaction with the training was high, with F2F and simulation training preferred. Statistically significant improvements in self-efficacy for healthcare skills, positive attitudes towards mental illness, and mental health-related knowledge and confidence were found post training. Qualitative analyses of interview and survey data indicated that participants had translated learning to practice through improved attitudes and behavioural changes when working with patients experiencing a mental health crisis.

### *Value*

This training improved mental health-related knowledge, confidence and self-efficacy and reduced mental health-related stigma in professionals who provide urgent care to people in mental health crisis. Participants reported changes to their practice following training; this is important as care has been inadequate for this group. Workforce planners and leaders should consider implementing this or similar training widely.

### *Key Words*

Crisis Support, Non-Mental Health Professionals, Training

**WORDS - 245**

## **Background**

People experiencing a mental health crisis come into contact with a range of professionals who are not mental health specialists. The Mental Health Crisis Care Concordat (2014) states "All (health and

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3 *social care*) staff should have the right skills and training to respond to mental health crises  
4 appropriately". However, a report by the Care Quality Commission (2015) noted that such  
5 professionals "appear to lack compassion and warmth in how to care for and speak to people who  
6 are having a crisis". Similarly, people with mental illness commonly report experiencing stigma and  
7 discrimination from healthcare staff (O'Reilly *et al.*, 2010; Rong *et al.*, 2011, Clifton *et al.*, 2016). This  
8 may result from non-mental health professionals lacking the necessary skills and knowledge.  
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Mental health-related training may help, though the evidence for the effectiveness of such training  
is mixed. In a randomised controlled study of classroom-based mental health training for police  
officers (Scantlebury *et al.*, 2017), reporting of mental health-related incidents improved, but there  
was no impact on the number of incidents reported. However, a review of educational interventions  
aimed at reducing mental health-related stigma found improvements in knowledge and behaviour  
(Thornicroft *et al.*, 2016), with interventions which included social contact found to be most  
effective, at least in the short term (Mehta *et al.*, 2015; Thornicroft *et al.*, 2016; Mehta *et al.*, 2015).

Simulation training, where clinical scenarios are recreated in safe environments, generally aims to  
improve quality of care by focusing not only on increasing participants' knowledge, but on human  
skills essential for high quality care such as multi-disciplinary collaboration, communication and  
reflection (Thomson *et al.*, 2013; Miller *et al.*, 2012; Attoe *et al.*, 2016; Billon *et al.*, 2016; Thomson-  
*et al.*, 2013; Miller *et al.*, 2012). Simulation training has been used extensively for medical education,  
but it is yet to flourish in mental health training (Attoe *et al.*, 2016;). For a range of conditions, it has  
been found to lead to an increase in knowledge and confidence (Bremner *et al.*, 2006; Zigman *et al.*,  
2013; Fernando *et al.*, 2017; Piette *et al.*, 2018; Zigman-*et al.*, 2013) and improved attitudes  
(Goldfarb and Gorrindo, 2005; Kowalski *et al.*, 2017; McNaughton *et al.*, 2008; Thomson *et al.*, 2013;  
Kowalski *et al.*, 2017), and clinical behaviours (Lavelle *et al.*, 2017).

This study aimed to evaluate the effectiveness of training in managing mental health crises for non-  
mental health professionals working in urgent care settings. Informed by the above research the  
training was developed to include social contact with people with mental health problems, a focus  
on stigmatising attitudes and behaviours and on skills development.

## Methods

### *Study design*

The study employed a multi-mixed-methods design to assess the learning of training participants,  
the reasons for this learning and impact on returning to the workplace. The methods were informed  
by Kirkpatrick's Four Levels of Evaluation model, with data collected for each level (see Table 1)

(Kirkpatrick, 1959; Kirkpatrick, 1998). This model is a well-established and effective method for evaluating the effectiveness of training programmes in a variety of healthcare contexts ([Lavoie-Tremblay et al., 2012](#); [Blumenthal et al., 2014](#); [Fernandez et al., 2015](#); [Dorri et al., 2016](#); [Fernandez et al., 2015](#); [Lavoie-Tremblay et al., 2012](#)).

Ethical approval was granted by the University of West London College of Nursing, Midwifery and Healthcare Research Ethics Committee, and King's College London Psychiatry, Nursing and Midwifery Research Ethics Committee.

*Table 1.* Kirkpatrick's four Levels of Evaluation (Kirkpatrick, 1959; Kirkpatrick, 1998).

Level of Evaluation	Evaluation Description	Evaluation Methods
Reaction	Participants' satisfaction with the training	Post-training questionnaires* Post-training interviews
Learning	Changes in participants' confidence, mental health-related stigma, healthcare skills Improved mental-health knowledge	Pre and post-training questionnaires* Post-training interviews
Behaviour	Application of learning to the workplace	Post-training interviews
Results	Satisfaction with care received by people experiencing a mental health crisis or their carers or relatives	Post-training interviews (staff views on impact on patients and carers as a proxy measure of patient/carer views)

- [Please see measures section for details: \*Mental Illness Clinicians Attitudes \(MICA-4\)\* \(Gabbidon et al., 2013\), \*Reported and Intended Behaviour Scale \(RIBS\)\* \(Evans-Lacko et al., 2011\), \*Human Factors Skills for Healthcare Instrument \(HFSHI\)\*, \*Course specific questions scale\*, \*Course evaluation questionnaire\*.](#)

### Participants

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3 Participants were recruited from ambulance and police services, general practice and A&E  
4 departments across the Thames Valley region via adverts on Trust websites. Support was required  
5 from managers to attend, places were funded by Health Education England Thames Valley (HEETV).  
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### 8 9 *Training*

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12 The training was designed by a team of academics and mental health practitioners from three Higher  
13 Education Institutions in Thames Valley, Maudsley Simulation and MIND Buckinghamshire. The aim  
14 was to improve staff knowledge, confidence, attitudes and skills to support someone experiencing a  
15 mental health crisis.  
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20 Funding for a two-day course plus additional simulation training for those with a particular interest  
21 e.g. service mental health leads, was provided. To minimise the requirement for backfill, day one  
22 consisted of eE-learning produced by the HEE e-Learning for Healthcare (eLfH) team which meant it  
23 was easily accessible via most NHS sites. Day two was a face to face (F2F) experiential study day  
24 where, following an overview of the e-l-learning (to review knowledge and in case some participants  
25 had not completed it), staff and participants developed and role-played meaningful scenarios which  
26 were followed by a reflective debrief whereby participants reflected on what happened in the role  
27 plays including what was done well and what could have been done better. A cost-effective and  
28 easy-to-roll-out method of including Ssocial contact was included in the training was through the use  
29 of videos of real life stories which were produced by MIND Buckinghamshire; this was a cost-  
30 effective approach which would be easy for others wishing to deliver this training to implement. The  
31 simulation training courses were designed and delivered by clinical and educational experts in  
32 mental health, with the help of technicians and actors to run simulated scenarios, and service user  
33 input to the training development (for example, further detail provided in Fisher, Vishwas, Cross &  
34 Attoe, 2019).  
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### 45 46 47 *Procedure*

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49 Participants were administered questionnaires (as detailed below) prior to and immediately post the  
50 F2F day and simulation training in order to assess changes in their knowledge, confidence, attitudes  
51 and skills and to assess their satisfaction with the training. All participants provided informed  
52 consent, were informed of their right to withdraw and given information on the study.  
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57 Participants were asked to indicate their consent to be approached for interview three to six months  
58 after their training session. Interviews were conducted by a member of the research team who was  
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3 blinded to the training programme, at a convenient time and location for participants, and were  
4 audio-recorded and transcribed verbatim for analysis.  
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### 8 *Measures*

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10 A range of measures was used to assess changes in attitudes (MICA-4, Gabbidon et al., 2013, and  
11 RIBS, Evans-Lacko et al., 2011), knowledge and confidence (Likert scales) and skills (HFSHI, Reedy et  
12 al., 2017) as well as satisfaction with the training (course evaluation questionnaire).  
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17 *Mental Illness Clinicians Attitudes (MICA-4)* (Gabbidon et al., 2013): This validated scale comprises 16  
18 items, rated on a six6-point Likert scale. A low total score represents less stigmatizing attitudes  
19 towards mental illness and psychiatry.  
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23 *Reported and Intended Behaviour Scale (RIBS)* (Evans-Lacko et al., 2011): Self-report past, current  
24 and intended behavioural discrimination towards people with mental health problems is assessed  
25 using a validated 8-item self-report questionnaire. A high score indicates high intended social  
26 proximity (i.e. how close an individual is willing to get to someone with a mental health problem).  
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31 *Human Factors Skills for Healthcare Instrument (HFSHI)*: this is a 12-item self-report questionnaire,  
32 rated by participants on a 10-point Likert scale from 1 (definitely cannot do) to 10 (definitely can do)  
33 to measure self-efficacy. Clinicians were given the original version of the questionnaire, while non-  
34 clinical participants were given an adjusted version, both of which have been validated (Reedy et al.,  
35 2017). A higher score represents higher self-efficacy.  
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40 *Course specific questions scale*: This 7-item self-report questionnaire was developed for this study  
41 and comprises statements relating to confidence and knowledge of mental health crisis care, rated  
42 on a 10-point Likert scale from 1 (totally disagree) to 10 (totally agree). Higher scores indicate higher  
43 self-reported confidence and knowledge.  
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48 *Course evaluation questionnaire*: This structured survey, developed for this study. included a range  
49 of questions evaluating the simulation course, both open ended questions with free-text responses  
50 to collect feedback on their experience of the training, and statements to rate on a 5-point Likert  
51 scale.  
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### 55 *Data Analysis*

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Paired samples t-tests using SPSS 21 (IBM Corp 2012), explored change in participants' human factors skills, knowledge, confidence and attitude scores pre and post training, with effect size calculated using Cohen's D. Means and standard deviations were calculated from satisfaction ratings from the post-training evaluation survey.

Free text responses to post training evaluation questions and interview data were assessed separately using thematic analysis to examine participants' perceptions of the impact of the simulation training. Free text responses and verbatim transcripts of the interviews were coded independently, then agreed, by two researchers (free text responses: CA and PM; interviews: EB and RM). An initial list of codes was developed through repeated reading of the transcripts. The list of codes was then reviewed by the two researchers who then identified and agreed themes. Any codes that were unclear were re-visited in the transcripts to clarify their meaning and ensure proper theme assignment~~Data were transcribed before two researchers completed free coding and subsequently decided on final codes, organising them into themes for interpretation~~ (Green and Thorogood, 2004). Themes were agreed by the team.

## Findings

### *Demographic Data*

The e-learning, which was mandatory for attending the F2F and simulation training, was available for one year (September 2017 to August 2018), 706 staff from the HEETV region completed it. Thirteen F2F days and 25 simulation training days were held. Staff had a range of backgrounds including nursing, allied health, social care and administrative and professional support staff, with demographics summarised in Table 2.

**Table 2:** Training participant characteristics

		F2F	Simulation Training
Total trained (n)		88	203
Male (n)		57	122
Female (n)		22	81
Age range		22 to 60 years	21 to 65 years
Profession/role (n)	Nurse	32	61
	Doctor	3	24

	Other healthcare	5	29
	Police	37	43
	Ambulance	0	46
Time since qualifying		1 to 33 years	1 to 35 years
Personal experience of mental health problems (%) [standardised questions from - RIBS]	Lived with someone with a mental health problem	42.7%	47.2%
	Worked with someone with a mental health problem	73.2%	84.1%
	Had neighbour with a mental health problem	20.7%	18.8%
	Close friend with a mental health problem	68.3%	71.9
	Personal Mental Health problem - yes	28%	24.3%
	Personal Mental Health problem - prefer not to say	6.1%	4.5%

Fifty-nine participants (29%) had completed both F2F and simulation training.

A total of eight participants agreed to be interviewed after two email reminders. Five were police officers (with varying roles), one was a nurse, another a GP trainee and the final a receptionist/healthcare assistant in an A&E department. All had attended the F2F training and five had attended the simulation training. Interviews lasted an average of 21 minutes.



## Quantitative Findings

### Mental Health Stigma

#### F2F participants:

Mental health-related stigma was reduced post intervention, though changes were not statistically significant: attitudes improved [MICA-4 mean (SD) pre = 35.4 (6.8); post = 34.0 (7.9)  $p = 0.051$ ,  $n = 70$ ]; intended behaviour improved [RIBS mean (SD) pre = 16.9 (2.2); post = 17.3 (2.3)  $p = 0.047$ ,  $n = 74$ ]. Improvements were also seen between baseline and three months follow up, though only a few participants returned the follow up measures (MICA-4  $n = 10$ , RIBS  $n = 11$ ) so these findings should be interpreted with caution: attitudes improved [MICA-4  $n = 10$ , mean (SD) pre = 35.4 (5.6); post = 32.7 (4.6)  $p = 0.01$ ]; intended behaviour improved [RIBS  $n = 11$ , mean (SD) pre = 15.3 (2.1); post = 15.6 (3.6)  $p = 0.79$ ].

#### Simulation training participants:

There was a statistically significant decrease in RIBS scores, from pre course ( $M = 12.53$ ,  $SD = 4.52$ ) to post course ( $M = 11.54$ ,  $SD = 5.13$ ),  $t(159) = -2.29$ ,  $p = 0.023$ , (with a small effect size  $-0.18$ ) this showed that after simulation training there was a decrease in behavioural discrimination among people with mental health problems. A similar pattern was found on scores of the MICA-4, with post training scores ( $M = 56.10$ ,  $SD = 16.56$ ) dropping compared to pre training scores ( $M = 58.32$ ,  $SD = 9.49$ ), however this was not statistically significant,  $t(162) = -1.69$ ,  $p = 0.094$ .

### Healthcare Skills

#### F2F participants:

Overall, participants' scores on the HSFH scale were higher post training, this difference was statistically significant: [HSFH mean (SD) pre = 147.0 (16.6); post = 152.5 (16.3)  $p < 0.0001$ ,  $n = 70$ ]. This improvement was maintained three months post training in the 11 participants for whom data were available, though the change from baseline was not statistically significant: mean (SD) pre = 139.2 (20.4); post = 147.7 (17.4)  $p = 0.07$ .

#### Simulation training participants:

There was a statistically significant increase in HSFH scores pre course ( $M = 135.66$ ,  $SD = 27.97$ ) to post course ( $M = 148.36$ ,  $SD = 22.39$ ),  $t(151) = 5.75$ ,  $p < .001$ . Effects sizes were medium, 0.47.

### Knowledge and Confidence

#### F2F participants:

Compared with before training, participants reported statistically significant improvements post training in their knowledge and confidence to manage someone experiencing a mental health crisis. [sum of Likert scales mean (SD) pre = 26.03 (7.77); post 19.29 (5.45),  $p < 0.0001$ ,  $n = 68$ ]. This improvement was maintained at 3 months in the 10 participants for whom data are available. [sum of Likert scales mean (SD) pre = 28.50 (6.69); post 21.20 (5.65),  $p < 0.0001$ ,  $n = 10$ ].

#### Simulation training participants:

Significant improvement in participants' ratings of their ability to manage patients experiencing a mental health crisis was also found post training compared with pre training: CSQ scores pre course [ $M = 46.06$ ,  $SD = 14.79$ ] to post course [ $M = 53.16$ ,  $SD = 17.12$ ],  $t(163) = 5.08$ ,  $p < 0.001$ . Effects sizes were medium, 0.40.

### Qualitative Survey Findings

Thematic analysis of participants' responses to the evaluation survey post F2F and simulation training identified three broad categories: increased engagement with people experiencing a mental health crisis; improved empathy and communication with people experiencing a mental health crisis; and plans to liaise and collaborate more with other professionals. Supporting quotes are identified by participant number.

#### Increased engagement

There was consensus that, following the training, participants planned to engage more with people experiencing a mental health crisis: "be more interactive with mental health patients instead of waiting GP/CAMHS" (P53) and "keep offering a friendly face and support despite not being able to fix" (P66). They referred to anticipating being more confident in their interactions: "be less anxious about talking to anyone with mental health issues" (P63), being prepared to spend more time with such people, reflecting on how their own actions may impact on people in crisis and moderating their behaviour accordingly: "self-reflecting how I am acting/ feeling is being perceived" (P53) and "Be more aware of how my actions may impact the patient" (P76) and acting on patient need "move

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3 *patient no matter how busy, try to move patient away from crowded room, try to engage first with*  
4 *the patient” (P85). Reports of having an increased understanding of the reasons underlying*  
5 *challenging behaviour may be related to this: “appreciate how up bringing can directly affect mental*  
6 *health and behaviour” (P54).*  
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### 10 *Empathy and Communication*

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14 The majority of participants commented that they felt that, having attended the course, they would  
15 be better able to communicate with people experiencing a mental health crisis. Some listed specific  
16 skills they had learned and planned to use such as: ‘validation’, using silence, admitting when they  
17 do not have the answers, explaining procedures, using both direct and open questions more  
18 often, observing body language, listening actively and discussing suicide risk openly as part of a risk  
19 assessment. Many comments appeared to reflect an intention to display more empathy: *“be able to*  
20 *understand in more detail what a person is suffering from” (p13), be less judgemental or*  
21 *stigmatising: “thinking of a mental health illness as the same as other illness” (P47), and to attempt*  
22 *to ensure that interactions with clients in crisis were positive: “ensure each interaction to be positive*  
23 *in some ways.” (P64). A few participants responded that they planned to look after their own and*  
24 *their colleagues’ mental health better: “look closer at stress at work” (P51).*  
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34 Several participants reported that, as a result of the training, they had learned how to communicate  
35 better with someone in crisis *“how to speak and engage with someone in crisis” (P13). Related to*  
36 *this were reports of increased empathy and ability to ‘mentalise’ (the ability to see ourselves as*  
37 *others see us, and others as they see themselves) “understanding what feelings that person has and*  
38 *your own feelings” (P1) and “learning about how to validate someone's feelings rather than be*  
39 *dismissive (accidentally or otherwise)” (P52). A new ability to assess risk, including suicide risk and to*  
40 *be able to identify that someone was in crisis was reported. One participant reported having gained*  
41 *skills in their own stress management.*  
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### 51 *Liaison and collaboration*

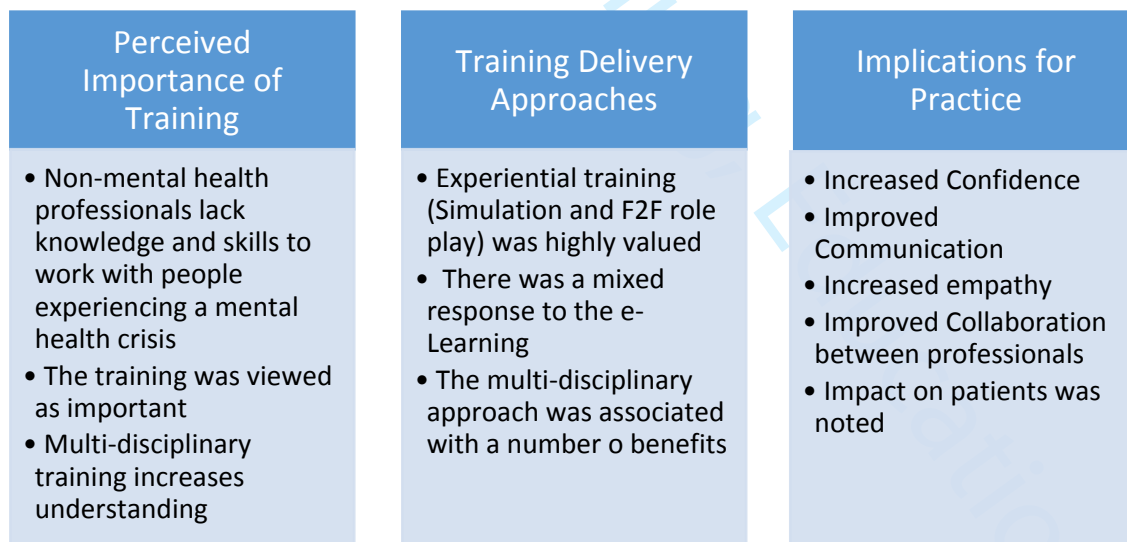
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54 Participants were explicit that undertaking the training with others from a range of professions was  
55 highly valued: *“Listening to experience from those not in policing” (P56) and “hearing different*  
56 *perspective from different professionals and work environments” (P65). They felt that this increased*  
57 *their understanding of others’ roles and how they could better work together. Consequently,*  
58 *participants’ responses evidence much greater preparedness to liaise with other professionals and*  
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services, with some participants commenting that notifying emergency services would no longer be their first response: *"call crisis team before ambulance"* (P25). This appeared to be related to comments around understanding the role and availability of other services and that other services to their own also face challenges which they should consider: *"have more consideration to the impact that my decision may have upon partner agencies"* (P40). Several participants responded that they planned sharing their learning with their team, presumably so that their immediate colleagues would work more effectively with people experiencing mental health difficulties: *"pass on knowledge to colleagues"* (P51). A minority of responses concerned plans to liaise with the client's friends and family: *"check about social network as a priority"* (P83).

### Qualitative Interview Findings

Thematic analysis identified three main themes: perceived importance of training; training delivery approaches; and implications for practice (see figure 1).

**Figure 1:** Themes and main findings from the eight interviews



#### *Perceived Importance of Training*

Participants were consistent in agreeing that the training was important and cited several reasons for this. For instance, participants noted the current lack of training for professionals such as

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3 ambulance, police, and GP receptionists on managing mental health crises which they agreed meant  
4 that they lacked knowledge and understanding essential for their work.  
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8 *“(We) spend hours and hours, um, with people who are threatening to...end their life, and they*  
9 *don’t consider things like suicide impact factors, which the NHS get a lot of training in..... We*  
10 *don’t get negotiator training, no, nothing like that.....They’re relying on us to be effective*  
11 *communicators.” (P1, police officer)*  
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15 The training raised awareness among the different professionals that this lack of knowledge and  
16 understanding existed in professions other than their own, which was contrary to their expectations.  
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20 *“it came to light how much...or how little knowledge or experience that they had of mental*  
21 *health.....they had very little understanding, and certainly had very little understanding of*  
22 *how...you know, the Mental Health Act is actually implemented.” (P2, police officer)*  
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26 *“there was a lot of staff from the police there who was unaware of as regards all the mental*  
27 *health, erm, and...with teenagers ... teenage absconding...and what to do with the teenagers*  
28 *that, you know, do have problems. Erm, and what most surprised me is that I would have called*  
29 *the police, and they were unaware of what they should be doing.” (P4, nurse)*  
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34 The training was important as it equipped them with skills to use in a challenging environment  
35 where previously they had felt uncertain.  
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39 *“ we were taught...and it was, like, ‘there’s no right answer.’ And, I thought that was really*  
40 *good, because there is no right answer, because every single situation is different, every person*  
41 *is different.” (P8, police officer)*  
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45 *“I know that, even if I had a mental health practitioner with me, they would do exactly the*  
46 *same thing, under the circumstances. And there’s no fear factor from the unknown then,*  
47 *which, I think a lot of my colleagues still suffer from.” (P1, police officer)*  
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### 51 *Training Delivery Approaches*

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54 Some participants found the e-learning approach useful, however, others stated that there was too  
55 much. It was noted that not all participants completed the e-learning prior to attending the  
56 experiential sessions which impacted negatively on their learning.  
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3 *"I'm not a lover of e-learning...I found it quite difficult. There was, er, a lot of stuff that you*  
4 *had to read, ..... and I was trying to do it at work with people around me, so I found it quite,*  
5 *quite hard."* (P8, police officer)  
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9 *"the e-learning, was considerable, it was huge.....(but) I thought it was important for me to do,*  
10 *because face to face in the education sessions, it felt like some people hadn't done it,*  
11 *and...they were almost at a completely different level...they didn't know what was being talked*  
12 *about."* (P3, GP trainee)  
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17 The experiential sessions (simulation and F2F) were viewed favorably by participants. All  
18 participants, without exception, were very positive about the simulation training, which was  
19 perceived as challenging but valuable.  
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23 *"They [the simulation sessions] were very stressful, but very useful. It gave us the scary crisis,*  
24 *high pressure situation, without it having to be a patient's life at risk...but it was useful to be*  
25 *able to go to pieces in a situation with an actor."* (P3, GP trainee)  
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29 *"There's not a lot of opportunities to practice what we're taught... we're obviously given those*  
30 *information about how to conduct ourselves, appropriate approaches, dealing with people...*  
31 *de-escalating hostile situation, but it's very rarely do we get to put that into practice in a safe*  
32 *controlled manner with realistic settings.....and then the feedback afterwards... it was just*  
33 *fantastic."* (P6, police officer)  
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39 The aspect of the training consistently and strongly highlighted as valuable was the multi-disciplinary  
40 approach. It was noted that opportunities for multi-disciplinary training are rare which results in  
41 poor communication between professions who have to work together.  
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45 *"joint working, sort of like as a group, was very useful...., I think it was very much an eye-*  
46 *opener of how little knowledge they (ambulance staff) had, you know, or how little input*  
47 *training they had, which...I...from my point of view as a police inspector, I...kind of, they're my*  
48 *partners that I'm relying on as first point of call, as...as...and hoping that they would have*  
49 *more understanding, but it appeared not to be."* (P2, police officer)  
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55 This multi-disciplinary training was valued for providing them with an understanding of others' roles  
56 and perspectives, as well as an understanding that different professions have different learning  
57 needs.  
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3 *'...for me it was working better with the paramedics for their safety and understanding*  
4 *their needs and what they want to get out of the situation comparatively to what*  
5 *[police] officers want to get out of the situation' (P6, police officer)*  
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9 *'[MD learning was] useful because there was more than one profession represented in*  
10 *the room. And everyone has a different viewpoint...a different angle on how that*  
11 *particular issue affects their professional life...'* (P1, police officer)  
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### 15 16 17 18 *Implications for Practice* 19

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21 Participants consistently agreed that their knowledge of mental health and how this affects  
22 individuals and their families had increased following the training. This resulted in them having a  
23 greater empathy for people experiencing a mental health crisis, which was embedded in a more  
24 holistic view of the person than previously held.  
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28  
29 *"it can be very frustrating.. because a lot of the time...it's not like someone's got a broken leg*  
30 *or cut arm. You can see the injury there, but when someone's going through a mental health*  
31 *problem you can't see it. So...there's a lot of patience involved and a lot of understanding and*  
32 *a...an appreciation for what that person's going through. And that's what's also helped .....I've*  
33 *got better understanding now, so I can support them better."* (P6, police officer)  
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39 This increased empathy and knowledge was seen as contributing to improved confidence in  
40 interacting with people experiencing a mental health crisis. One participant noted that this had  
41 impacted positively on patient experience:  
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45 *"I would like to think he was more confident because I was more confident. So, he felt*  
46 *calmer because I was...I was happy having him there and felt a bit more in control of*  
47 *what was going on, and I think that gave him confidence as well."* (P7, receptionist)  
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51 Participants also reported improved communication skills when working with people experiencing a  
52 mental health crisis. For instance, a nurse discussed how the training had encouraged her to check  
53 that patients would be able to follow her recommendations, rather than just giving advice and  
54 expecting them to follow it.  
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3 *"It's not just, 'you must do this, and follow my advice'. I'm probably saying, 'follow my advice,*  
4 *do you think that's do-able?' Or, you know, 'how do you feel? Do you think you can do that? Is*  
5 *there anything that's stopping you?'" (P4, nurse).*  
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9 And a police officer discussed how he had learned to speak to someone experiencing a psychotic  
10 episode in a more compassionate and effective way.  
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14 *"the techniques that they taught you to...how to speak to them and to obviously ask open*  
15 *questions...and things like, 'tell me about what's going on, I'm here to listen to you', um, kind*  
16 *of like showing empathy and sympathy and that.... but obviously never.....go along with what*  
17 *they're seeing, so if they're saying, yeah, 'there's unicorns dancing around the room and*  
18 *things, do you see them?', I remember the training saying never, um, encourage that kind of*  
19 *thing."* (P5, police officer)  
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25 Participants also reported better listening skills following the training which they associated with  
26 their increased empathy for people experiencing a mental health crisis. They felt that this allowed  
27 them to ask more appropriate questions which would lead to better care delivery.  
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31 *"the one thing that I took back was.... when you're dealing with somebody and, obviously,*  
32 *you're listening to what they're saying, but sometimes you might not always hear them*  
33 *because obviously your mind is sort of, racing....and....you might misinterpret what they're*  
34 *saying. So...so, what I found, and I've actually used this,....you reiterate back to them and you*  
35 *say 'so what you're saying is, the reason you're feeling low is.....' if I'd not done that then I*  
36 *wouldn't have maybe got to the issue that was causing them to call us."* (P8, police officer).  
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42 *"I think the thing that I learned from it most was about listening to people. Er, listening more*  
43 *and asking more questions."* (P4, nurse)  
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## 50 Discussion

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53 Non-mental health professionals from a range of urgent care settings appear to have benefited from  
54 a multi-mixed method training to support work with people experiencing a mental health crisis. They  
55 demonstrated improved attitudes, self-efficacy in healthcare skills, confidence and knowledge  
56 relating to working with people in crisis. Qualitative analyses highlighted benefits to confidence,  
57 communication skills, empathy and multi-disciplinary collaboration.  
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3 These findings are supported by earlier studies which demonstrate improved confidence and  
4 knowledge relating to mental healthcare following training ([Fernando et al., 2017](#); McNaughton et  
5 al., 2008; [Piette et al., 2018](#); Thomson et al., 2013; Zigman et al., 2013; [Fernando et al., 2017](#); [Piette](#)  
6 [et al., 2018](#)). Similarly the low pre-training levels of mental health knowledge and confidence found  
7 here has been found in urgent care staff in other studies (Bradley, 2009; McLean and Marshall,  
8 2010). This is concerning as these professionals support people in crisis as a significant part of their  
9 workload. Additionally, participants reported that they were not provided training opportunities and  
10 practical support for them to develop mental health specific knowledge and confidence at work.  
11 Consequently, there may have been selection bias in this study as participants self-selected to  
12 attend mental health training. Nonetheless, the low initial scores, significant increases, and reported  
13 lack of support in the workplace highlight the importance of providing such training to this staff  
14 group. A disparity is evident here between the structure of care pathways and workforce  
15 development provided, with urgent and emergency care settings and emergency services serving as  
16 the 'frontline' for many mental health crises, although little mental health training or practical  
17 support is provided in these settings.

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19 Improved attitudes were evidenced in both the quantitative and qualitative ~~measures used~~ data. This  
20 aligns to findings in the mental health training literature ([McNaughton et al., 2008](#); Kowalski et al.,  
21 2017; [Piette et al., 2018](#); ~~McNaughton et al., 2008~~), and evidence that social contact in training  
22 interventions can reduce stigma ([Mehta et al., 2015](#); Thornicroft *et al.*, 2016; ~~Mehta et al., 2015~~), in  
23 this case in the form of role played scenarios and simulated patients. Quantitative improvements to  
24 attitudes were contextualised by qualitative findings, highlighting increased empathy towards  
25 people in mental health crises, interest in spending more time with patients, and listening and asking  
26 questions to determine an appropriate course of action. Interview data suggested that interacting  
27 with actors (simulated patients), being able to reflect on experiences, and the opportunity to  
28 consider the perspective of patients were useful learning tools in achieving attitude change, similar  
29 to other studies ([Mehta et al., 2015](#); [Thornicroft et al., 2016](#); ~~Mehta et al., 2015~~). Kowalski et al.,  
30 2017; [Piette et al., 2018](#)); ~~Thornicroft et al., 2016; Mehta et al., 2015~~). Furthermore, interview data  
31 highlighted that participants were adopting new ways of working based on their attitude change,  
32 with reported positive effects. This suggests that training promoting attitudinal changes can be  
33 effective in improving workplace practice and behaviours.

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35 Skill development was also demonstrated, through both improved self-efficacy scores in human  
36 factors skills, and qualitative findings. Experiential training has previously been found beneficial for  
37 this ([Billon et al., 2016](#); Kowalski et al., 2017; Lavelle et al., 2017). The most notable skills highlighted

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3 were communication and multidisciplinary collaboration, which are essential for the delivery of high  
4 quality, safe patient care (Leonard et al, 2004). These elements were attributed to the opportunity  
5 to practice and learn from others, as well as engage in interprofessional education with a  
6 multidisciplinary group of participants. This is an important finding to note for those developing non-  
7 mental health workforces to support people with mental health needs: emphasising the importance  
8 of effective communication, understanding others' roles and skills and how these relate to providing  
9 appropriate care appears key. While obtaining interprofessional and multidisciplinary groups for  
10 training in mental health can be challenging, this data suggests that doing so is particularly  
11 beneficial.  
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### 19 *Limitations*

20 Findings from across datasets are consistent which implies that findings are valid. However, a larger  
21 sample for the qualitative study would have ensured that each professional group was adequately  
22 represented and that all aspects of the training had been discussed. Nevertheless, despite having  
23 different backgrounds and experience, participants' views were consistent. While the findings from  
24 interviews were useful in highlighting the longitudinal impact of the training, this requires replication  
25 on a larger scale to determine effectiveness.  
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32 Validated outcome measures were used where possible, but a lack of appropriate evaluation tools  
33 meant that some tools were created for this study. Nonetheless, this study has a large sample for an  
34 educational intervention study in this field, with sufficient quantitative data to draw robust findings  
35 However, there were insufficient participants to determine whether there were perceived  
36 differences in experience and benefits gained according to which training methods have been  
37 accessed, with only interview data able to address this question. Additionally, data collection was  
38 entirely based on self-report, raising the possibility of data being influenced by biases, including  
39 social desirability. Likewise, a lack of control group comparisons prevents interpretation of the  
40 specific effects and learning that have originated from the training sessions.  
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48 Finally, this evaluation could not fully assess the impact of the training on professional practice or on  
49 patient experience. Questionnaire data and free-text comments suggest that staff intended to  
50 implement the new knowledge and skills they had developed, and interview data, including where  
51 staff had provided specific examples, indicate that staff had changed their practice. However, further  
52 research including objective measurement of clinical practice, outcomes and experience would be  
53 merited to determine changes in practice.  
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## Conclusions

Mental health crisis training for non-mental health professionals can improve confidence, knowledge, healthcare skills, attitudes and potentially the clinical practice of staff who work in urgent care settings. Investment in such training provision and in research that clarifies the impact on clinical practice and patient experience in a highly important part of the healthcare delivery system is merited.

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