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Psychological resilience in people experiencing schizophrenia and suicidal thoughts and

behaviours.

Abstract:

Background: Negative stressors can aggravate the impact of schizophrenia. However, some people find ways of combating such stressors. There is a dearth of research examining factors which enable individuals with schizophrenia to show psychological resilience.

Aims: The goal of this study was to investigate resilience to negative stressors in people with disorders on the schizophrenia spectrum using a qualitative methodology.

Methods: Data was collected from 23 participants who had experienced schizophrenia and suicidal thoughts and behaviours. Semi-structured interviews followed a topic guide. Participants were asked i. what resilience meant to them, ii. which stressors they had experienced over 12 months, and iii. how they had counteracted those stressors. Thematic analysis was conducted to identify re-occurring themes across interviews.

Results: A continuum of psychological mechanisms described participants' views about the meaning of resilience which ranged from passive acceptance to resistance (e.g., withstanding pressure), and then to active strategies to counter stressors (e.g., confronting). These themes were also evident in narratives expressing personal resilience strategies but, additionally, included emotional coping techniques. External factors were highlighted that supported resilience, including, social support, reciprocity, and religious coping.

Conclusions: People with schizophrenia develop ways of being resilient to negative events which should inform therapeutic interventions.

Key words: schizophrenia; psychosis; psychological resilience; qualitative methods; stressors

Introduction

Mental health problems on the schizophrenia spectrum often cause extreme distress to individuals; are usually associated with life-long disability; and are linked with substantial individual and societal costs (Millier et al., 2014). Negative stressors exacerbate the harmful psychological effects of this mental health problem (Bolton, Gooding, Kapur, Barrowclough, & Tarrier, 2007). Such stressors may be external, for example, financial pressures (Beebe, 2002); internal, for example, different types of hallucinations (Docherty et al., 2015); or societal, for example, stigma (Ruesch et al., 2014) and hospitalisation procedures (Berry, Ford, Jellicoe-Jones, & Haddock, 2013, 2015). In addition, negative stressors are typically one of the first stages in pathways leading to suicidal thoughts and behaviours (Williams, 1997) with death by suicide and multiple suicide attempts being highly prevalent in people experiencing schizophrenia (Mork et al., 2012; Qin, 2011). However, not everyone with schizophrenia who experiences negative stressors finds that they are unable to counter them (Phillips, Francey, Edwards, & McMurray, 2009). Therefore, it is important to identify the factors which confer psychological resilience to a range of stressors in those with schizophrenia.

Psychological resilience is considered to be a protective mechanism which operates in the face of negative stressors or negative life events (Bonanno, 2004; Masten, 2001). However, previous work investigating psychological resilience in the context of severe mental health problems, specifically schizophrenia, has been predominantly quantitative and based on heterogeneous definitions of resilience, and heterogeneous methodologies (Mizuno, Wartelsteiner, & Frajo-Apor, 2016). Furthermore, there is no guarantee that the way in which people with mental health problems define or experience psychological resilience melds with psychological conceptualisations of resilience.

It follows that it is essential that resilience research is based on service-user informed perspectives, which explicitly *focuses* upon psychological resilience, for three reasons. First, within the literature, resilience has been conceptualised and defined in many different ways (Mizuno et al.,

2016). Research which focuses on understanding and improving mental health care will benefit from using conceptual definitions based on service-user viewpoints. Second, and relatedly, some work illustrates that it is necessary to understand people's perceptions of their mental health problems, including schizophrenia and psychosis, if treatment and recovery programs are to be optimised (Connell, Schweitzer, & King, 2015; Hamm & Leonhardt, 2016; Sumskis, Maxham, & Caputi, In Press; Waite, Knight, & Lee, 2015). This means that understanding the ways in which people who experience schizophrenia have dealt with negative stressors and difficult situations can support the development of interventions to promote psychological wellbeing and resilience to future stressors which are not only service-user informed, but, more importantly, are service-user led. Third, if communication between health professionals and service-users around resilience is to be maximally effective then a shared understanding of resilience is vital (Collins, Peters, & Watt, 2011). Consequently, it is imperative to understand explicitly both i what the term resilience means to those experiencing mental health problems on the schizophrenia spectrum, and ii what promotes resilience from the perspectives of those who experience such mental health problems.

Nurturing psychological resilience in people experiencing mental health problems is an important therapeutic and public health goal (APA). It can be argued that such ventures will be successful only if an understanding of what resilience means and an understanding of factors which can promote psychological resilience in the face of negative internal stressors (e.g., hearing internal denigrating voices) and external stressors (e.g., being made redundant) is shared between mental health professionals and those with experience of severe mental health problems (Chisholm, Hart, Mann, & Peters, 2014; Cranwell, Polacsek, & McCann, 2016; Ditton-Phare et al., 2015; Peters et al., 2009). This necessitates the use of qualitative methodologies to understanding personal experiences of resilience to negative stressors in those with severe mental health problems.

The personal experiences of building psychological resilience in people with schizophrenia remains under-researched, particularly via the use of qualitative methodologies. In one exception to the dominance of quantitative research work in this area, a study which aimed to explore

experiences of first episode of psychosis used a qualitative design and methodology. A key finding from this study was that the ability to self-pace and feel in control over aspects of their mental health problems helped participants to counter relapse and the worsening of symptoms which the authors labeled as a resilience mechanism (Henderson & Cock, 2015). However, the goal of the study by Hwas not to explore psychological resilience. A more recent study, also with a focus on resilience to symptoms of schizophrenia, reported a tension between being challenged by schizophrenia but also in being supported (Sumskis et al., In Press). Neither of these studies probed resilience mechanisms which could be used to overcome the effects of negative stressors in those with schizophrenia and which are important with respect to developing effective psychological interventions.

Therefore, the purpose of the current study was to explore explicitly what resilience meant to service-user participants, and to investigate factors which have promoted resilience to negative stressors, in people experiencing schizophrenia from their perspectives.

Method

Participants

Participants were recruited from a larger study using opportunity sampling (Johnson, Gooding, Wood, Fair, & Tarrier, 2013). In total, 23 individuals participated in the current study. All were outpatients accessing mental health services in North West England, UK. They were recruited by referral from their key-worker, community mental health teams, early intervention services, assertive outreach teams, supported housing associations, and voluntary organisations.

There were four inclusion criteria which were: i. a clinical diagnosis of a schizophrenia spectrum disorder based on the International Statistical Classification of Diseases [ICD-10] (WHO, 1992); ii. aged 18 years or over; iii. sufficient English language skills to engage with the interview; iv. capacity to give informed consent. Participants were excluded if they had an organic disorder or if drug use was judged to be the main cause of the schizophrenia spectrum disorder. There were no inclusion or exclusion criteria with respect to duration of mental health problems.

Measures used to characterise the sample

Resilience Appraisal Scale[RAS] (Johnson, Gooding, Wood, & Tarrier, 2010). This is a

12 item measure of psychological resilience. Participants indicate to what extent each statement applies to them using a five point likert scale with higher scores reflecting greater resilience. Cronbach's alpha reliabilities have been reported as .88 for the total scale, .92 for the emotion coping subscale, .92 for the situation coping subscale, and .93 for the social support subscale (Johnson, Gooding, Wood, & Tarrier, 2010).

Suicidal Behaviours Questionnaire-Revised [SBQ-R] (Osman, Bagge, Gutierrez, &

Konick, **2001).** This is a four-item measure which assesses the level of suicidality experienced by a participant over the lifetime, and in the past year. Likelihood and intent of attempting suicide is also assessed. Cronbach's alpha reliabilities have been reported as ranging from 0.76 to 0.87 (Osman et al., 2001).

Interview

Based on consensus from research team meetings, an interview topic guide was developed. The following five questions were asked:

- 1. "What does resilience mean to you?"
- 2. "Have you experienced any stressful life events this year?"

If the response was "Yes"

- 3. "Would you mind telling me what they were?"
- 4. "Do you think you showed resilience in the face of these events?"

If the response was "Yes"

5. "What was it that enabled you to show that resilience?"

6. "Is there anything else you want to add about resilience?"

Interview questions were designed to enable participants to elaborate on factors that they

felt were important in defining and promoting resilience. Prompts were used, especially with

respect to the first question, because some participants struggled to articulate the meaning of resilience. Prompts included:

"..... any ideas? If someone is resilient, kind of, what would that mean about them?"

" Ok, resilient is kind of like hardy, like tough, like resistant to life's problems."

" So, people would say, kind of, that it means that you can endure despite difficulties." Interviews were audio-taped, transcribed, and anonymised with prior participant consent.

Procedure

This study was approved by a National Health Service Research Ethics Committee. Participants first completed the Broad Minded Affective Coping or relaxation procedures (Johnson et al., 2013). Following this, participants were interviewed using the topic guide.

Analysis

Thematic analysis (Braun & Clarke, 2006) was used to facilitate the identification of key themes across participant responses. Subjective interpretation was not appropriate, as participant responses were assumed to reflect their experiences. The analysis was based on an inductive, exploratory approach with a realist stance (Braun & Clarke, 2006) and was conducted by the first three authors (PG, DL, RO). First, transcripts were independently examined and similar response content grouped into codes. Second, through group discussion based on repeatedly comparing initial codes against each other, codes were reduced and grouped into themes. These initial themes were checked against data extracts and refined to ensure they were entirely representative of the data.

Results

Participant characteristics

Demographic data was available for 21 participants comprising 14 males and seven females. Nineteen had a diagnosis of schizophrenia, one had a diagnosis of schizoaffective disorder, and one had a diagnosis of atypical psychosis. Nineteen participants were Caucasian. The means, (*SDs*), and [ranges] for age, suicidality, and resilience were 43.6 (*12.8*) [20 - 67], 8.67 (*3.76*) [3 -17], and 44.76 (*7.15*) [33 - 53], respectively.

The main sources of negative stressors reported by participants were mental illnesses and the illness or death of a friend or relative "Err... well my brother was ill you know and that was stressful, really stressful. He was in [NAME] hospital for about six or seven weeks. That was stressful" [ID 11]. Mental illnesses which were identified as stressors included symptoms of schizophrenia "Yeah, a couple of them I have, and I've got low......Erm, voices that came back and erm, that was stressful" [ID 33], depression", "I have at times been very very depressed as if everything's a stress when really it's not, so I don't know where it comes from" [ID 25], and suicidality "and I couldn't get these suicidal thoughts out of my head... and then, the most like, toughest part was I actually tried to slit my wrists. Erm...." [ID 1].

Overview of key findings

Themes which were identified from the question, "what does resilience mean to you?" were grouped along a spectrum of internal psychological mechanisms. At one end of the spectrum, resilience was conceptualised as the passive acceptance of stressors, whilst at the other end of the spectrum resilience was viewed as an active response to stressors, which usually involved confronting, challenging, or fighting the stressor. Themes were labeled: (1) acceptance; (2) resistance; (3) an active response to stressors (see Figure 1).

Insert Figure 1 around here

Themes which were identified in response to the question, "what was it that enabled you to show resilience?" were grouped into: (1) internal psychological mechanisms, and (2) external factors. Internal psychological mechanisms overlapped with the 'passive acceptance to active responses' spectrum identified from the meaning of resilience question, with the addition of cognitive and emotional coping strategies to the active responses category. The theme of 'external factors', was grouped into: (1) social support, (2) social reciprocity, and (3) religion.

Meaning of resilience (see figure 1)

Meaning of resilience: acceptance. For a small number of participants, being resilient was described as being able to accept difficult life events. Here, resilience was conceptualized as a

psychological process, in which individuals made a decision to accept the event "..its' how you absorb what's going on around you" [ID15], rather than attempting to suppress or challenge it "You can come to terms with everything" [ID25].

Meaning of resilience: resistance. The majority of participants viewed resilience as something which prevented difficult life events from having a negative effect on them, either psychologically, emotionally, or in terms of preventing them from carrying out their responsibilities. This protective internal barrier had three purposes. First, it allowed them to withstand pressure "...not caving in under pressure" [ID35], and "...sort of keeping going" [ID18]. Second, it provided inner strength, "...having a thick skin isn't it" [I27]. Third, it enabled them to do things for themselves.

"..just get on with things as best as you can, without bothering anyone really... get on with all your duties, your responsibilities whatever you need to do" [ID25]

"I suppose it's being able to stand up on your own two feet. I'm resilient that way, doing everything for yourself" [ID31]

Meaning of resilience: active response to stressors. Participants defined resilience as an active process which involved challenging or overcoming difficult life circumstances. Two types of response were described. First, 'bouncing back' which had connotations of inner strength, but participants talked about strength in a more active way by perceiving resilience as the consequence of using strength to overcome a stressor "Energy to fight back" [ID19], and "A sense of not being defeated" [ID18]. Second, participants described a generalised sense of the ability to cope "it would mean like how they cope with things" [ID1].

Promoting resilience: internal psychological mechanisms (see Figure 2)

The internal psychological mechanisms which were identified overlapped significantly with the spectrum of acceptance, resistance, and active responses depicted in response to the meaning of resilience question (see Figure 1). However, there were key differences in the type of acceptance experienced and the addition of specific cognitive and emotional coping strategies.

Insert Figure 2 around here

Promoting resilience: acceptance. The facilitation of acceptance was described through the ability to perceive difficult life events in a different light. This was achieved by putting the events in context and seeing that:

"It's life itself – I've seen worse times" [ID8].

"...basically it's like what goes around comes around and I've had to take it on the chin kind of, you know, and think to myself well, you know, I've left people feeling the same way that I'm feeling now, so it serves myself right really" [ID2]

"I think it's like past experiences really, like no matter how bad things are I can, well up to now, I can always remember a worse time so I build on that really" [ID32]

Promoting resilience: resistance. The resistance described here was essentially the same as the resistance described previously, which served to block the effects of negative life events by "...not caving under pressure" [ID35], "Getting on with it" [ID35] and "Drawing on [inner] strength" [ID18].

Promoting resilience: active responses. Participants described both cognitive "logically putting things in order in your head" [ID=19] and emotional coping strategies "......facing up to the fears" [ID=35] which helped them to be resilient. Some participants described how they tried to condition themselves to remain positive "I have to condition myself every day, to think positive things rather than negative things" [ID32], or to be balanced "it was just like a matter of trying to stay rational" [ID27]. Other participants expressed how they sought to regulate their emotional states to enable them to be resilient.

"Well most of the time I've got the confidence to deal with my emotions because I have to be very controlled" [in the context of hurting people physically] [ID32]

"I tried not to get, what's the word, I tried not to, I just tried to stay calm basically" [ID27]. Promoting resilience: external factors (see Figure 2). Aside from the internal strategies participants drew upon to show resilience, they also highlighted the role of external factors which promoted resilience. These factors encapsulated a sense of being helped by someone else; being depended upon to help someone else; and getting help or guidance from religious beliefs.

Promoting resilience: social support. Social support was the most widely emphasised external factor, with some participants referencing support from those who had also experienced mental health problems.

"I think if you don't have friends, you're lost. If you're on your own, you're f----d – I mean, you'd be lost. It must be a nightmare not to have mates" [ID6]

"Social support, well I mean my friends are supportive, most of them know I've had, like, a history of mental health problems" [ID27]

Promoting resilience: social reciprocity. Here, the desire to help or support others meant that having resilience appeared to be seen as a necessary prerequisite.

"So many people with depression, so many people with cancer. I'd like to help them. Apart from, I think it might help me a bit more if I help somebody else." [ID8]

"... when I walked in the classroom, the exam room, and er, I said 'Oh, hi [NAME]' – 'Don't speak to me, please don't speak to me.' And I remember thinking, she's losing it, and I thought no, I can't lose it, I had to help, it was like I felt responsible for everyone in the room, it was almost like a mothering instinct came in" [ID19]

Promoting resilience: religion. For a few participants, their religious beliefs and faith was described as providing support through difficult times.

"I think God will see me through this time. I think it's my faith – in the Bible. Without it, I couldn't have managed. I would have had no one to turn to" [ID8]

"Well yeah – because, err... I have me religion that helps me, with death itself, so that helps me – religion. In that situation? I'm a [RELIGIOUS BELIEF] so I acknowledge the

bible and it mentions things about death and the condition of the dead, so that kind of helped me with that loss" [ID7]

Discussion

The current study examined the meaning of resilience together with factors perceived as promoting resilience to negative stressors in those experiencing psychosis. This is one of the first studies to examine psychological resilience in an explicit and targeted manner using a qualitative methodology in individuals with a mental illness on the schizophrenia spectrum. Three main findings should be emphasised.

The first finding was that participants' responses concerning both the meaning of resilience, and the components of personal resilience which counteracted negative stressors, fell on a continuum ranging from passive acceptance, to resistance at the mid-point, and then to active responses at the opposite end of the continuum. Existing definitions of resilience highlight the active and midpoints of this continuum, reflecting dynamic resistance to stressors (Rutter, 1999) and bouncing back from adversity (Windle, Bennett, & Noyes, 2011). The current findings underscore the importance of nurturing a range of both passive and active routes to developing and maintaining a personally meaningful conceptualisation of resilience in people with schizophrenia, and emphasise the need to be mindful of passive resilience strategies.

The second finding was that around 20% of the sample did not appear to understand the term resilience. This is, perhaps, indicative of treatment options which focus on remediating areas of difficulty rather than promoting areas of resilience. In accord with the literature documenting the need for effective communication between health professionals and service-users (Collins et al., 2011), it is clearly important that clinicians and service-users have a shared understanding of the meaning of resilience in settings where interventions focus on building psychological resilience. That said, even those who lacked an understanding of the meaning of resilience could still offer instances of their use of personal resilience strategies to negative stressors.

The third main finding was that both internal psychological mechanisms and external factors were perceived to promote psychological resilience from a service-user perspective. In terms of internal mechanisms, responses were equally balanced for perceptions that stressors can be resisted or blocked, and that coping and emotional strategies can be developed to combat negative stressors. Our results indicate that there may be psychological mechanisms based on *resistance* which are effective in building resilience to stressors. This is a novel area which future work should develop further.

Considering the external factors which conferred resilience, our finding that social support is important is consistent with work showing that social isolation is problematic in schizophrenia (Gayer-Anderson & Morgan, 2013; Hooley, 2010; Wickham, Taylor, Shevlin, & Bentall, 2014), and that social support is an important component of resilience (Kleiman & Riskind, 2013; Kleiman, Riskind, & Schaefer, 2014), including in those experiencing psychosis (Johnson, Gooding, Wood, Taylor, et al., 2010). This is buttressed by resilience research in a large sample of police officers which illustrated the importance of social support in countering adversity (deTerte, Stephens, & Huddleston, 2014). Some qualitative work has also illustrated ways in which peer support may off-set isolation in people experiencing schizophrenia (Oakland & Berry, 2015). This fits with both qualitative and quantitative findings showing that social support may be important in the recovery process (Jolley et al., 2014; Soundy et al., 2015).

Reciprocity was also identified as an important external factor which promotes resilience. This melds with work from the suicide prevention arena demonstrating that lack of social reciprocity is a dimension of thwarted belongingness, which is posited to be central to the development of suicidality (Joiner et al., 2009). Furthermore, two recent qualitative studies with people experiencing schizophrenia and those with bipolar disorders found that a reason for taking part in studies investigating suicide was an altruistic motive reflecting a desire to help others (Owen, Gooding, Dempsey, & Jones, 2016; Taylor et al., 2010).

Religion was the least reported of the external factors generated. That said, there is a growing body of evidence which indicates that religion may protect individuals from suicidal thought and behaviours (Koenig, 2012). An interesting aspect of the current results is that the benefits of religion were not tied to social support but appeared to be more akin to religious coping (Rosmarin, Bigda-Peyton, Oengur, Pargament, & Bjoergvinsson, 2013). Consequently, it is important for clinicians to discuss patients' religious preferences in a context of fostering resilience.

Clinical Implications and strengths

Three clinical implications should be highlighted which also illustrate the strengths of this work. First, our study is unique in taking a qualitative approach to explicitly exploring psychological resilience to negative stressors in those with a severe mental health problem, namely, schizophrenia. It is important for clinicians, health professionals, and researchers alike to understand resilience from service-user perspectives because it facilitates communication in a collaborative context. Second, our findings illustrated that people experiencing schizophrenia understood resilience and were able to identify factors which had promoted resilience in their lives. This is, clinically, very important because it highlights an avenue for the development of psychological interventions in accord with the conclusions of a recent review (Mizuno et al., 2016). Third, experiencing negative stressors are part of the first stages in the pathways to suicidal thoughts and behaviours in those with schizophrenia (Bolton et al., 2007). Hence, identifying mechanisms and factors which confer resilience to such stressors opens up an important suicide prevention strategy which, rather than focusing on countering the negative, may instead target the positive.

Limitations

Four limitations of this study warrant discussion. First, participants were asked to recall stressful events that had occurred within the past year to illustrate ways in which they had shown psychological resilience to such stressors. Consequently, it is possible that recall biases may have been operating. Second, only the perceptions of people with experiences of psychosis were sought.

Future work should elicit views exploring building psychological resilience in this population from a range of health professionals and carers. Third, the sample was predominantly Caucasian. Hence, our findings may not extend to other cultures (e.g., Greek, Caribbean, Latin American, Asian) where perceptions of mental health problems may differ (Mascayano et al., 2016; Tzouvara, Papadopoulos, & Randhawa, 2016). Fourth, we did not explicitly ask participants about the effectiveness of their coping or resilience strategies.

Conclusions

In conclusion, this study is novel because it i. defines the meaning of resilience, and ii. illustrates the psychological mechanisms and factors used to promote resilience to negative stressors, in the context of perceptions from people who experience mental health problems on the schizophrenia spectrum. Psychological interventions should aim to maintain and build resilience in such individuals by i. ensuring that patients and clinicians have a shared meaning and understanding of resilience, ii. embracing and developing a continuum of passive, resistive, and active internal psychological mechanisms which promote resilience, and iii. by strengthening the potential for social support, social reciprocity, and religious coping to enhance psychological resilience.

References:

- APA. The Road to Resilience. Retrieved from http://www.apa.org/helpcenter/road-resilience.aspx
- Beebe, L. H. (2002). Problems in community living identified by people with schizophrenia. *Journal of psychosocial nursing and mental health services*, 40(2), 38-45.
- Berry, K., Ford, S., Jellicoe-Jones, L., & Haddock, G. (2013). PTSD symptoms associated with the experiences of psychosis and hospitalisation: A review of the literature. *Clinical Psychology Review*, 33(4), 526-538. doi:10.1016/j.cpr.2013.01.011
- Berry, K., Ford, S., Jellicoe-Jones, L., & Haddock, G. (2015). Trauma in relation to psychosis and hospital experiences: The role of past trauma and attachment. *Psychology and Psychotherapy-Theory Research and Practice*, 88(3), 227-239. doi:10.1111/papt.12035
- Bolton, C., Gooding, P., Kapur, N., Barrowclough, C., & Tarrier, N. (2007). Developing psychological perspectives of suicidal behaviour and risk in people with a diagnosis of schizophrenia: We know they kill themselves but do we understand why? *Clinical Psychology Review*, 27(4), 511-536.
- Bonanno, G. A. (2004). Loss, Trauma, and Human Resilience: Have We Underestimated the Human Capacity to Thrive After Extremely Aversive Events? *American Psychologist*, *59*(1), 20-28.
- Braun, V., & Clarke, V. (2006). Using thematic analysis in psychology. *Qualitative Research in Psychology,* 3(2), 77-101. doi:<u>http://dx.doi.org/10.1191/1478088706qp0630a</u>
- Chisholm, A., Hart, J., Mann, K., & Peters, S. (2014). Development of a behaviour change communication tool for medical students: The 'Tent Pegs' booklet. *Patient Education and Counseling*, 94(1), 50-60. doi:10.1016/j.pec.2013.09.007
- Collins, S., Peters, S., & Watt, I. (2011). Medical communication.
- Connell, M., Schweitzer, R., & King, R. (2015). Recovery From First-Episode Psychosis and Recovering Self: A Qualitative Study. *Psychiatric Rehabilitation Journal*, 38(4), 359-364. doi:10.1037/prj0000077
- Cranwell, K., Polacsek, M., & McCann, T. V. (2016). Improving mental health service users' with medical co-morbidity transition between tertiary medical hospital and primary care services: a qualitative study. *Bmc Health Services Research*, 16. doi:10.1186/s12913-016-1567-3

- deTerte, I., Stephens, C., & Huddleston, L. (2014). The Development of a Three Part Model of Psychological Resilience. *Stress and Health*, *30*(5), 416-424. doi:10.1002/smi.2625
- Ditton-Phare, P., Halpin, S., Sandhu, H., Kelly, B., Vamos, M., Outram, S., . . . Loughland, C. (2015).
 Communication skills in psychiatry training. *Australasian Psychiatry*, 23(4), 429-431.
 doi:10.1177/1039856215590026
- Docherty, N. M., Dinzeo, T. J., McCleery, A., Bell, E. K., Shakeel, M. K., & Moe, A. (2015). Internal versus external auditory hallucinations in schizophrenia: symptom and course correlates. *Cognitive Neuropsychiatry*, 20(3), 187-197. doi:10.1080/13546805.2014.991387
- Gayer-Anderson, C., & Morgan, C. (2013). Social networks, support and early psychosis: a systematic review. *Epidemiology and Psychiatric Sciences*, 22(2), 131-146. doi:10.1017/s2045796012000406
- Hamm, J. A., & Leonhardt, B. L. (2016). The Role of Interpersonal Connection, Personal Narrative, and Metacognition in Integrative Psychotherapy for Schizophrenia: A Case Report. *Journal of Clinical Psychology*, 72(2), 132-141. doi:10.1002/jclp.22247
- Henderson, A. R., & Cock, A. (2015). The Responses of Young People to Their Experiences of First-Episode Psychosis: Harnessing Resilience. *Community Mental Health Journal*, 51(3), 322-328. doi:10.1007/s10597-014-9769-9
- Hooley, J. M. (2010). Social Factors in Schizophrenia. Current Directions in Psychological Science, 19(4),
 238-242. doi:10.1177/0963721410377597
- Johnson, J., Gooding, P. A., Wood, A. M., Fair, K. L., & Tarrier, N. (2013). A Therapeutic Tool for Boosting Mood: The Broad-Minded Affective Coping Procedure (BMAC). *Cognitive Therapy and Research*, 37(1), 61-70. doi:10.1007/s10608-012-9453-8
- Johnson, J., Gooding, P. A., Wood, A. M., & Tarrier, N. (2010). Resilience as positive coping appraisals: Testing the schematic appraisals model of suicide (SAMS). *Behaviour Research and Therapy*, 48(3), 179-186. doi:10.1016/j.brat.2009.10.007
- Johnson, J., Gooding, P. A., Wood, A. M., Taylor, P. J., Pratt, D., & Tarrier, N. (2010). Resilience to suicidal ideation in psychosis: Positive self-appraisals buffer the impact of hopelessness. *Behav Res Ther*, 48(9), 883-889.

- Joiner, T. E., Van Orden, K. A., Witte, T. K., Selby, E. A., Ribeiro, J. D., Lewis, R., & Rudd, M. D. (2009). Main Predictions of the Interpersonal-Psychological Theory of Suicidal Behavior: Empirical Tests in Two Samples of Young Adults. *Journal of Abnormal Psychology*, 118(3), 634-646.
- Jolley, S., Ferner, H., Bebbington, P., Garety, P., Dunn, G., Freeman, D., . . . Kuipers, E. (2014). Delusional belief flexibility and informal caregiving relationships in psychosis: a potential cognitive route for the protective effect of social support. *Epidemiology and Psychiatric Sciences, 23*(4), 389-397. doi:10.1017/s2045796013000553
- Kleiman, E. M., & Riskind, J. H. (2013). Utilized Social Support and Self-Esteem Mediate the Relationship Between Perceived Social Support and Suicide Ideation A Test of a Multiple Mediator Model. *Crisis-the Journal of Crisis Intervention and Suicide Prevention, 34*(1), 42-49. doi:10.1027/0227-5910/a000159
- Kleiman, E. M., Riskind, J. H., & Schaefer, K. E. (2014). Social Support and Positive Events as Suicide Resiliency Factors: Examination of Synergistic Buffering Effects. *Archives of Suicide Research*, 18(2), 144-155. doi:10.1080/13811118.2013.826155
- Koenig, H. G. (2012). Religion, spirituality, and health: the research and clinical implications. ISRN psychiatry, 2012, 278730-278730. doi:10.5402/2012/278730
- Mascayano, F., Tapia, T., Schilling, S., Alvarado, R., Tapia, E., Lips, W., & Yang, L. H. (2016). Stigma toward mental illness in Latin America and the Caribbean: a systematic review. *Revista Brasileira De Psiquiatria*, 38(1), 73-85. doi:10.1590/1516-4446-2015-1652
- Masten, A. S. (2001). Ordinary magic: Resilience processes in development. *American Psychologist. Vol,* 56(3), 227-238.
- Millier, A., Schmidt, U., Angermeyer, M. C., Chauhan, D., Murthy, V., Toumi, M., & Cadi-Soussi, N.
 (2014). Humanistic burden in schizophrenia: A literature review. *Journal of Psychiatric Research*, 54, 85-93. doi:10.1016/j.jpsychires.2014.03.021
- Mizuno, Y., Wartelsteiner, F., & Frajo-Apor, B. (2016). Resilience research in schizophrenia: a review of recent developments. *Current Opinion in Psychiatry*, 29(3), 218-223. doi:10.1097/yco.00000000000248

- Mork, E., Mehlum, L., Barrett, E. A., Agartz, I., Harkavy-Friedman, J. M., Lorentzen, S., . . . Walby, F. A.
 (2012). Self-Harm in Patients with Schizophrenia Spectrum Disorders. *Archives of Suicide Research*, *16*(2), 111-123. doi:10.1080/13811118.2012.667328
- Oakland, L., & Berry, K. (2015). "Lifting the veil": a qualitative analysis of experiences in Hearing Voices Network groups. *Psychosis-Psychological Social and Integrative Approaches*, 7(2), 119-129. doi:10.1080/17522439.2014.937451
- Osman, A., Bagge, C. L., Gutierrez, P. M., & Konick, L. C. (2001). The Suicidal Behaviors Questionnaire-Revised (SBQ-R):Validation with Clinical and Nonclinical Samples. *Assessment*, 8(4), 443-454.
- Owen, R., Gooding, P., Dempsey, R., & Jones, S. H. (2016). The Experience of Participation in Suicide Research from the Perspective of Individuals with Bipolar Disorder *Journal of Nervous and Mental Disease*.
- Peters, S., Rogers, A., Salmon, P., Gask, L., Dowrick, C., Towey, M., . . . Morriss, R. (2009). What Do Patients Choose to Tell Their Doctors? Qualitative Analysis of Potential Barriers to Reattributing Medically Unexplained Symptoms. *Journal of General Internal Medicine*, 24(4), 443-449. doi:10.1007/s11606-008-0872-x
- Phillips, L. J., Francey, S. M., Edwards, J., & McMurray, N. (2009). Strategies used by psychotic individuals to cope with life stress and symptoms of illness: a systematic review. *Anxiety Stress and Coping*, 22(4), 371-410. doi:10.1080/10615800902811065
- Qin, P. (2011). The impact of psychiatric illness on suicide: Differences by diagnosis of disorders and by sex and age of subjects. *Journal of Psychiatric Research*, 45(11), 1445-1452.
 doi:10.1016/j.jpsychires.2011.06.002
- Rosmarin, D. H., Bigda-Peyton, J. S., Oengur, D., Pargament, K. I., & Bjoergvinsson, T. (2013). Religious coping among psychotic patients: Relevance to suicidality and treatment outcomes. *Psychiatry Research, 210*(1), 182-187. doi:10.1016/j.psychres.2013.03.023
- Ruesch, N., Mueller, M., Lay, B., Corrigan, P. W., Zahn, R., Schoenenberger, T., . . . Roessler, W. (2014).
 Emotional reactions to involuntary psychiatric hospitalization and stigma-related stress among people with mental illness. *European Archives of Psychiatry and Clinical Neuroscience*, 264(1), 35-43. doi:10.1007/s00406-013-0412-5

- Rutter, M. (1999). Resilience concepts and findings: implications for family therapy. *Journal of Family Therapy*, *21*(2), 119-144. doi:10.1111/1467-6427.00108
- Soundy, A., Stubbs, B., Roskell, C., Williams, S. E., Fox, A., & Vancampfort, D. (2015). Identifying the facilitators and processes which influence recovery in individuals with schizophrenia: a systematic review and thematic synthesis. *Journal of Mental Health*, 24(2), 103-110. doi:10.3109/09638237.2014.998811
- Sumskis, S., Maxham, L., & Caputi, P. (In Press). Meaning of resilience as described by people with schizophrenia. *International Journal of Mental Health Nursing*.
- Taylor, P. J., Awenat, Y., Gooding, P., Johnson, J., Pratt, D., Wood, A., & Tarrier, N. (2010). The Subjective Experience of Participation in Schizophrenia Research A Practical and Ethical Issue. *Journal of Nervous and Mental Disease, 198*(5), 343-348.
- Tzouvara, V., Papadopoulos, C., & Randhawa, G. (2016). Systematic review of the prevalence of mental illness stigma within the Greek culture. *International Journal of Social Psychiatry*, *62*(3), 292-305. doi:10.1177/0020764016629699
- Waite, F., Knight, M. T. D., & Lee, D. (2015). Self-Compassion and Self-Criticism in Recovery in Psychosis: An Interpretative Phenomenological Analysis Study. *Journal of Clinical Psychology*, 71(12), 1201-1217. doi:10.1002/jclp.22211
- WHO. (1992). The ICD-10 classification of mental and behavioural disorders: Clinical descriptions and diagnostic guidelines. . Retrieved from Geneva:
- Wickham, S., Taylor, P., Shevlin, M., & Bentall, R. P. (2014). The Impact of Social Deprivation on Paranoia, Hallucinations, Mania and Depression: The Role of Discrimination Social Support, Stress and Trust. *Plos One*, 9(8). doi:10.1371/journal.pone.0105140
- Williams, J. M. G. (1997). Cry of pain. Harmondsworth, UK Penguin.
- Windle, G., Bennett, K. M., & Noyes, J. (2011). A methodological review of resilience measurement scales. *Health and Quality of Life Outcomes*, 9(8), 1-18. doi:doi:10.1186/1477-7525-9-8

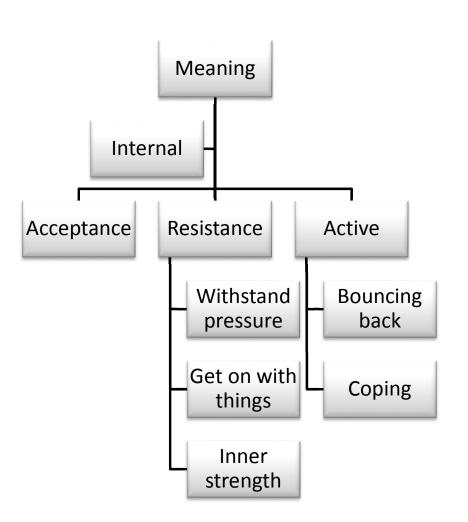
Figure legends:

Figure 1: The meaning of resilience

Figure 2: Resilience mechanisms and factors which countered negative stressors.

Psychological resilience in schizophrenia

Figure 1:



Psychological resilience in schizophrenia

Figure 2:

