

## Editorial

# Negative childhood experiences and mental health: theoretical, clinical and primary prevention implications†

John Read and Richard P. Bentall



## Summary

After decades of ignoring or minimising the prevalence and effects of negative events in childhood, researchers have recently established that a broad range of adverse childhood events are significant risk factors for most mental health problems, including psychosis. Researchers are now investigating the biological and psychological mechanisms involved. In addition to the development of a traumagenic neurodevelopmental model for psychosis, the exploration of

a range of psychological processes, including attachment and dissociation, is shedding light on the specific aetiologies of discrete phenomena such as hallucinations and delusions. It is argued that the theoretical, clinical and primary prevention implications of our belated focus on childhood are profound.

## Declaration of interest

None.

John Read (pictured) is Editor of the journal *Psychosis* and was Coordinating Editor of *Models of Madness: Psychological, Social and Biological Approaches to Schizophrenia* (Routledge, 2004). Richard Bentall is Professor of Clinical Psychology at the University of Liverpool. He is the author of *Madness Explained: Psychosis and Human Nature* (Penguin, 2003) and *Doctoring the Mind: Why Psychiatric Treatments Fail* (Penguin, 2009).

The study by Keyes *et al.*<sup>1</sup> in this issue, represents an important contribution to our understanding of the processes by which the maltreatment of children leads to mental health problems. Just 20 years ago, however, it would have been difficult to get the paper published. Mental health professions have been slow, even resistant, to recognise the role of childhood adversities in psychiatric disorder. The 20th century got off to a poor start when Freud repudiated his original discovery that many of his clients had been sexually abused and decided, instead, that these disclosures represented fantasies. As late as 1975, a leading US psychiatry textbook insisted that the rate of incest was only one per million. It was not until the end of the century that epidemiological studies revealed the alarming extent to which adults neglect and abuse children. Pressure to respond to these findings came more from the women's movement than from psychiatrists or psychologists. Our introduction of the post-traumatic stress disorder (PTSD) diagnosis in 1980 was not in response to abused children, but to Vietnam veterans. By the time we stopped dismissing disclosures of abuse as fantasies, we were busy misinterpreting the effects of childhood trauma as 'symptoms' of a plethora of 'mental illnesses' with predominantly biological aetiologies. The 'decade of the brain' at the end of the century was hardly conducive to understanding the long-term effects of childhood adversity, including – ironically – on the developing brain.

## Childhood adversity and mental health problems

Following this long period of neglect, however, recent studies have demonstrated that a wide range of adversities, and not just sexual abuse, are predictors of many forms of mental ill health, and not just PTSD. These adversities have been found to include: mother's ill health, poor nutrition and high stress during pregnancy; being

the product of an unwanted pregnancy; early loss of parents via death or abandonment; witnessing interparental violence; dysfunctional parenting (particularly 'affectionless overcontrol'); parental substance misuse, mental health problems and criminal behaviour; childhood sexual, physical and emotional abuse; childhood emotional or physical neglect; bullying; childhood medical illness; and war trauma.<sup>2,3</sup> Of course, it is very likely that these types of events have their impact in interaction with other factors such as heavy cannabis consumption, genetic predisposition and epigenetic processes.<sup>3</sup>

Some of these adversities have been shown to be intergenerational, so that parents who themselves suffered in childhood struggle to provide an optimum environment for their own children. This finding can be used to counter the argument that research into intrafamilial causes of mental health problems is undesirable because it is 'family blaming'. On the contrary, the findings should encourage us to identify the needs not only of the 'identified patient' but of parents and other family members, whose problems – often originating in their own childhoods – tend to go unnoticed.

Some of these adversities have also been found to be related to another powerfully intergenerational phenomenon, poverty, which has been characterised as 'the cause of the causes'. In their 2009 book, *The Spirit Level*,<sup>4</sup> epidemiologists Richard Wilkinson and Kate Pickett present convincing evidence that relative poverty may be an even stronger predictor of mental health than poverty *per se*. Countries with the worst disparities between richest and poorest have the worst outcomes, not only in mental health and drug misuse but also in physical health, violence, teenage pregnancies and, importantly for the topic at hand, child well-being.

The range of mental health outcomes for which childhood adversities are risk factors is equally broad. It might be quicker to list those *not* predicted by childhood adversity. Those that *are* include: in childhood – conduct disorder, attention-deficit hyperactivity disorder and oppositional defiant disorder; and, in adulthood – depression, anxiety disorders (including generalised anxiety disorder, phobias and PTSD), eating disorders, sexual dysfunction, personality disorder, dissociative disorder and substance misuse.<sup>2</sup> Moreover, childhood abuse is related to severity of disturbance whichever way one defines severity. People subjected to childhood physical or sexual abuse are more likely to be admitted to a psychiatric hospital; have earlier, longer and more

†See pp. 107–115, this issue.

frequent admissions; receive more psychiatric medication; are more likely to self-harm and to try to kill themselves; and have higher global symptom severity.<sup>3</sup>

In another valuable contribution to this literature, in a recent issue of the *Journal*, Kessler *et al* analysed data from 21 countries.<sup>2</sup> They concluded that 'childhood adversities were highly prevalent and interrelated'. They also found that 'childhood adversities associated with maladaptive family functioning (e.g. parental mental illness, child abuse, neglect) were the strongest predictors of disorders'. Of equal importance is their confirmation that 'childhood adversities have strong associations with all classes of disorders' and that there is 'little specificity across disorders'. They acknowledge, however, that the World Mental Health Surveys on which they based their analyses (as did Wilkinson & Pickett<sup>4</sup>) excluded psychosis. Many other studies relating to psychosocial aetiology exclude psychosis. Nevertheless, it is in this area that we find the most surprising findings.

### Childhood adversity and psychosis

Until very recently the hypothesis that abuse in childhood has a causal role in psychosis was regarded by many biologically oriented psychiatrists as heresy. Although the public all over the world (including patients and their families) place more emphasis on adverse life events than on genetics or brain abnormalities when asked about the causes of 'schizophrenia', David Kingdon found, in 2004, that for every British psychiatrist who agreed with the public, 115 thought psychosis is caused primarily by biological factors.<sup>5</sup> Nonetheless, the evidence on the association between childhood adversity and psychosis has accumulated at a staggering pace. The first large-scale general population studies did not appear until 2004.<sup>3,6</sup> By 2009 a review<sup>3</sup> had identified 11. Ten of these found that childhood maltreatment is significantly related to psychosis. The authors of the one exception corrected a flaw in their original study and found the same as the other ten.<sup>7</sup> Nine of the 11 tested for, and found, a dose-response relationship.<sup>3</sup> For example, a prospective study in The Netherlands<sup>6</sup> found, after controlling for history of hallucinations or delusions in first-degree relatives, that people who had been abused as children were nine times more likely than non-abused people to experience 'pathology-level psychosis'. The odds ratio for 'mild abuse' was 2.0, but 48.4 for 'severe abuse'.

The 2009 review<sup>3</sup> also reported a relationship between childhood abuse and the actual content of hallucinations and delusions, as well as research demonstrating that abuse disclosures by people diagnosed with schizophrenia are reliable. It cites seven studies of first-episode psychosis that confirm the relationship between adverse childhood events and negative outcomes. Another review<sup>8</sup> concluded: 'There is now considerable evidence of an association between child sexual abuse and psychosis. This relationship is at least as strong as, and may be stronger than, that with other mental disorders'.

Many researchers, such as Keyes and colleagues,<sup>1</sup> are now exploring the mechanisms and processes by which events in childhood can lead to mental health problems years later. For example, in an attempt to generate a genuinely integrated psycho-socio-biological approach,<sup>3</sup> the traumagenic neuro-developmental model<sup>9</sup> of psychosis (proposed by J.R. and colleagues) draws on the evidence that the biochemical and structural abnormalities found in people diagnosed with schizophrenia, which have often been portrayed as evidence of a 'brain disease', are also found in the brains of traumatised children. Animal research, in which it has been possible to examine the effects of adversity in precisely controlled conditions,

supports this general framework, showing, for example, that victimisation can lead to sensitisation of the dopamine system, which has long been thought to play a role in psychosis.

At a psychological level, researchers have focused on mechanisms that might mediate between childhood adversity and later mental health problems, including attachment, dissociation, psychodynamic defences, coping responses, impaired access to social support, and revictimisation.<sup>3,8,9</sup> This research has the potential to uncover specificities in the effects of adversity which may be difficult to see when only broad diagnoses are considered. For example, childhood sexual trauma appears to have a specific effect on the risk of hallucinations, which may reflect a long-term impact on the processes underlying source monitoring (the ability to differentiate internal and external stimuli); whereas attachment difficulties and more chronic victimisation, for example bullying, may increase the risk of paranoid delusions by affecting the way that individuals appraise unpleasant experiences.<sup>10</sup>

### Implications

The implications of our having finally taken seriously the causal role of childhood adversity are profound. Clinically, the first step is to ask about childhood events in order to facilitate meaningful formulations and comprehensive treatment plans. This is still not happening routinely in many services.<sup>11</sup> The impact of the introduction of National Health Service guidelines in 2008 remains to be seen.<sup>12</sup>

The most important implication is in the domain of primary prevention. George Albee<sup>13</sup> put it succinctly:

'Primary prevention research inevitably will make clear the relationship between social pathology and psychopathology and then will work to change social and political structures in the interests of social justice. It is as simple and as difficult as that!'

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### References

- 1 Keyes KM, Eaton NR, Krueger RF, McLaughlin KA, Wall MM, Grant BF, *et al*. Child maltreatment and the structure of common psychiatric disorders. *Br J Psychiatry* 2012; **200**: 107–15.
- 2 Kessler RC, McLaughlin KA, Greif Green J, Gruber MJ, Sampson NA, Zaslavsky AM, *et al*. Childhood adversities and adult psychopathology in the WHO World Mental Health Surveys. *Br J Psychiatry* 2010; **197**: 378–85.
- 3 Read J, Bentall RP, Fosse R. Time to abandon the bio-bio-bio model of psychosis: exploring the epigenetic and psychological mechanisms by which adverse life events lead to psychotic symptoms. *Epidemiol Psychiatr Soc* 2009; **18**: 299–310.
- 4 Wilkinson R, Pickett K. *The Spirit Level: Why Equality is Better for Everyone*. Penguin Books, 2010.
- 5 Read J, Haslam N, Sayce L, Davies E. Prejudice and schizophrenia: a review of the 'Mental illness is an illness like any other' approach. *Acta Psychiatr Scand* 2006; **114**: 303–18.
- 6 Janssen I, Krabbendam L, Bak M, Hanssen M, Vollebergh W, De Graaf R, *et al*. Childhood abuse as a risk factor for psychotic experiences. *Acta Psychiatr Scand* 2004; **109**: 38–45.
- 7 Cutajar M, Mullen P, Ogloff J, Thomas S, Wells D, Spataro J. Schizophrenia and other psychotic disorders in a cohort of sexually abused children. *Arch Gen Psychiatry* 2010; **67**: 1114–9.

- 8 Bebbington P. Childhood sexual abuse and psychosis: aetiology and mechanism. *Epidemiol Psychiatr Soc* 2009; **18**: 284–93.
- 9 Read J, Perry B, Moskowitz A, Connolly J. The contribution of early traumatic events to schizophrenia in some patients: a traumagenic neurodevelopmental model. *Psychiatry* 2001; **64**: 319–45.
- 10 Bentall RP, Fernyhough C. Social predictors of psychotic experiences: specificity and psychological mechanisms. *Schizophr Bull* 2008; **34**: 1012–20.
- 11 Read J, Hammersley P, Rudegeair T. Why, when and how to ask about child abuse. *Adv Psychiatr Treat* 2007; **13**: 101–10.
- 12 NHS Confederation. *Briefing 162: Implementing National Policy on Violence and Abuse*. Ministry of Health, 2008.
- 13 Albee GW. Revolutions and counter-revolutions in prevention. *Am Psychol* 1996; **51**: 1130–3.

## psychiatry in pictures

### Ashanti fertility dolls (*Akua'ba*)

Malcolm P. Weller

'Belief in myths allows the comfort of opinion without the discomfort of thought.'  
John F. Kennedy

In superstitions, intuitive concepts and spurious attribution coexist with acquired rational knowledge. In animals 'superstitious learning' based on intermittent rewards, unlike the withdrawal of predictable reward, is difficult to extinguish.

It might be thought that increasing environmental control would reduce reliance on unverified beliefs. Nevertheless, despite the conflict with religious prohibitions, in American society approximately one quarter believe in astrology, clairvoyance, ghosts and communication with the dead. Such beliefs, and good-luck charms, are often important parts of people's lives.

*Akua'ba* (from *Akua*, a day-name for a female born on a Wednesday, and *ba*, child; hence, *Akua's* child) refers to the fertility doll carved from wood by the Ashanti (more correctly, *Asante*), a major ethnic group of the Ashanti Region of Ghana. At their height they dominated most of Ghana, as well as parts of Togo and the Ivory Coast.

Fertility dolls are recommended by a herbalist, or generally a priest, and the woodcarver has high status, reinforcing prevailing belief. Like normal children, they are dressed and tied to the back, or form part of a home shrine when not being carried.

The line of descent in Ashanti culture is matrilineal. Dolls are thought to represent an ideal of feminine beauty, the likelihood of having a beautiful female child being increased in those who carry the doll. Accordingly, the dolls were also carried by pregnant women, but more often by infertile women. Apart from the normal desire for motherhood, infertility could raise suspicions of witchcraft. Because of the premium on fertility and the stress of infertility, associated physiological perturbations might be thought to aggravate infertility.

Anecdotal evidence suggests that women's fertility is lower in stressful circumstances and that conception is more frequent during or after a holiday, or after adoption, following a protracted period of infertility. The idea that stress limits fertility would be a natural barrier to population expansion at times of drought and famine and would be a mechanism for balancing population to resources. In support of these ideas, extreme weight loss, as in anorexia nervosa, leads to amenorrhoea. Ovulation in the Kung! of the Northern Kalahari desert area of Botswana, a non-contraceptive using population with a low fertility and a birth space interval of greater than 3 years, is linked to the rains, but otherwise there is no evidence to support these suppositions in humans when objective data are rigorously analysed, even in artificial fertility treatment.

It is estimated that one in three or four Ashanti women possessed a doll. Ironically, fertility in Ghana is low compared with most other African countries. The elevation of anecdote over evidence might be summarised in the present example by saying that the wish to mother is the thought.

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References available on request to Professor Malcolm P. Weller, School of Health and Social Sciences, Middlesex University, email: psychiatry@weller.tv. Image © Skeptiseum. Reproduced with permission.

