Depression in developing countries: lessons from Zimbabwe

Vikram Patel, Melanie Abas, Jeremy Broadhead, Charles Todd, Anthony Reeler

University of Zimbabwe Medical School, Harare, Zimbabwe
Vikram Patel *Beit research fellow*
Melanie Abas *lecturer*
Jeremy Broadhead *lecturer*
Department of Community Medicine, University of Zimbabwe Medical School
Charles Todd *senior lecturer*
Department of Psychiatry, University of Zimbabwe Medical School
Anthony Reeler *lecturer*
Correspondence to: V Patel, Sangath Centre, 841/1Alto Porvorim, Goa 403521, India vikpat@goatelecom.com

BMJ 2001;322:482–4

Depression is one of the most important causes of morbidity and disability in developing countries.[1] Zimbabwe, in common with other developing nations, has absolute poverty, economic reform programmes, limited public health services, widespread private and traditional healthcare services, civil unrest, cultural diversity, and sex inequality. We have conducted research on depression in Zimbabwe over the past 15 years, covering ethnographic and epidemiological studies in a range of populations. We compared our findings with research from other developing countries and with evidence from industrialised countries. In the context of developing countries we examined the validity of World Health Organization classifications and medical concepts of depression, the public health implications of depression, and the implications for clinical practice and research.

Summary points

- Depression is common in developing countries, especially in women, with a vicious cycle of poverty, depression, and disability
- Depression typically presents with multiple physical symptoms of chronic duration, though simple questions can often elicit psychological symptoms
- Anxiety often coexists with depression, and multiple diagnostic categories for common mental disorders have limited validity
- Low recognition and treatment of symptoms rather than cause are the hallmarks of current practice in general health care

The validity of Western biomedical models of depression

In Zimbabwe, multiple somatic complaints such as headaches and fatigue are the most common presentations of depression.[2 3] On inquiry, however, most patients freely admit to cognitive and emotional symptoms.[4] Many somatic symptoms, especially those related to the heart and the head, are cultural metaphors for fear or grief. Most depressed individuals attribute their symptoms to "thinking too much" (*kufungisisa*), to a supernatural cause, and to social stressors. Our data confirm the view that although depression in developing countries often presents with somatic symptoms, most patients do not attribute their symptoms to a somatic illness and cannot be said to have "pure" somatisation.[2 5 6] This means that it is vital to understand the culture specific terminology used by patients and to assess mood in those with multiple somatic complaints.

The labels of distress—As in many other languages, there are no direct equivalents in the Zimbabwean Shona language for the terms depression or anxiety.[7] In the West, these terms are used in everyday language to describe mood changes and by clinicians to denote illnesses. In Zimbabwe, the word "depression" is used almost exclusively to signify an illness, which rarely presents with emotional symptoms. There is therefore an incongruity between the term and its relevance for patients and health workers. As a result, case records that require health workers to state a diagnosis show far lower numbers of depression than is expected from epidemiological studies.[8] An alternative could be to identify local concepts that may signify depression. Shona models of illness, such as thinking too much (*kufungisisa*) and a belief that supernatural factors had caused the symptoms, have been shown to be closely linked to depression.[9–12] Similarly, labels such as *shenjing shuairuo* (neurasthenia) in China, *ghabrahat* (anxiety) in India, *pelo y tata* (heart too much) in Botswana, and "nerves" in some Latin American and South African societies are described as local illness categories that overlap with depression.[13–16]

Diagnosis and classification—The WHO self reporting questionnaire was used in studies in Zimbabwe in the 1980s.[17] Subsequently, the 14 item Shona symptom questionnaire (SSQ), written in the local language, was developed.[18] The two questionnaires classified more than 80% of primary care attenders in the same way, suggesting a high degree of agreement.[19] The symptoms represented in the items of the Shona questionnaire were remarkably similar to symptoms in instruments used to measure depression in the West. Analysis of main symptom scores showed that anxiety-depression and panic-phobias were strongly related.[2] ICD-10 (international classification of diseases, 10th revision) currently categorises depression separately from anxiety. Data from Zimbabwe, however, show that anxiety and depression are strongly associated with each other.[2] These findings are similar to those from other cultural settings[20] and from the recent multinational studies of common mental disorders,[21] suggest-

ing lack of a clear distinction between depression and generalised anxiety in primary care. Therefore, there is a need to review the validity of categorical diagnoses used in current guidelines (such as ICD-10) and to train health workers to diagnose and treat depression comorbid with anxiety.

The public health relevance of depression

In one study among adults a quarter of people attending primary care and a third attending traditional healer attenders had depression.[12] Up to 40% were still ill at 12 months,[22] and the incidence of new episodes was 16%.[23] The one month prevalence of depressive and anxiety disorders was 15.7% in a random sample of women from the community,[4] and the proportion with postnatal depression was 16%.[24] Such high rates of depression, particularly in women, have been reported in several recent studies from other developing countries,[25] with some community surveys reporting prevalence rates exceeding 50%.[26]

Risk factors for depression—In a clinic based case-control study, depression was significantly associated with female sex. After adjustment for age, sex, and clinic site, depression was significantly associated with chronicity of illness (>1 month), number of presenting complaints (≥3), lack of cash savings, job loss, and infertility in the previous year.[11] Persistence of depression at 12 months was associated with bereavement, higher morbidity scores, psychological illness, and greater disability.[22] Among the community sample of women, severe life events were significantly associated with the onset of depression, usually within one month.[27] Significant events were marital or other relationship crises, deaths, and events directly related to infertility or to an unwanted pregnancy. Women who had a severe event were less likely to develop depression if they had social support after the event and more likely to become depressed if they had been separated from their mother in childhood for more than a year. Evidence from Western countries is remarkably similar,[28] suggesting common mechanisms across cultures for the development of depression. Events involving loss of primary sources of self esteem seem to predict depression in societies in which this has been studied.[29] Women in Zimbabwe have a high rate of such events, which may partly explain their high incidence of depression. Evidence from the West suggests that vulnerability to events accumulates—for example, from childhood to adulthood.[28]

Cycle of poverty, disability, and depression—The relation between depression and change in economic status has been examined in cohorts derived from a clinic based case-control study.[22 23] Economic stressors, such as having experienced hunger in the past month, were associated with both the onset of new episodes of depression and the persistence of existing episodes. Disability scores (including social, functional, and psychological) were twice as high in subjects with depression throughout the follow up period, independent of economic status.[11 22 23] Depressed people visit health services frequently and also consult private doctors and traditional medical practitioners. This is associated with high financial costs of health care.[11 30] Similar findings in other developing countries suggest a vicious cycle of poverty, depression, illness, disability, increased health costs, inadequate health care, and further impoverishment.[25 26 31]

DURELL McKENNA/PANOS PICTURES

Life events and economic stressors are associated with episodes of depression

Implications for clinical management—In Zimbabwe most patients consult both the medical and traditional healthcare systems.[12 32] Few consult a mental health professional. Primary care providers are usually consulted first, but patients move on to providers of traditional care as the illness becomes chronic. Patients' perceptions of their illnesses and costs are the key factors in the choice between providers. Primary healthcare workers and private general practitioners commonly prescribe non-specific treatments such as analgesics, vitamins, and hypnotics.[30 32] Recognition of psychiatric morbidity by either traditional healers or medical staff was found to be related to a better outcome.[22] In Zimbabwe, this benefit is unlikely to be the result of antidepressant medications as they are rarely prescribed. In industrialised countries, randomised trials of antidepressant and brief psychological treatments in primary care have shown robust improvements in outcome.[33] There are no comparable data from developing countries. There are, however, descriptions of initiatives to train primary care workers[34] and pilots showing the effectiveness of brief counselling for survivors of torture[35] and of cognitive behaviour therapy for multiple somatic symptoms.[36]

Conclusions

Depression in Zimbabwe is common, especially in women, and causes considerable disability. Most patients do not receive effective treatment. The symptoms are fairly universal and methods to identify patients with depression that have been developed in

one culture can be used in others, as long as careful attention is given to conceptual translation. Somatic symptoms are the commonest presentations but are not specific for diagnosis. Chronic, multiple symptoms, however, should signal the possibility of depression and should lead to specific inquiry about cognitive and psychological symptoms. Most patients with a mental disorder have a mixture of depressive and anxiety disorder. Dimensional constructs (such as common mental disorders) are more useful in primary care settings than categorical classifications. Culture specific concepts of mental illness, which are similar to the medical model of depression, can be identified and incorporated into the training of health workers. Training guidelines should be based on the clinical problem solving approach rather than the categorical diagnostic approach, therefore the WHO guidelines[37] should be modified with these points in mind.

The implications of our study are that, firstly, depression should be included in the general medical training for all levels of health workers and, secondly, health policy in developing countries needs to recognise the considerable public health burden of depression, particularly in marginalised sections of the community. Key health service issues include strengthening of supervision and training for general health staff, putting antidepressants on to the essential drugs lists, limiting the use of medicines that just treat symptoms, and forming referral networks between traditional healers and voluntary organisations. Preventive strategies for depression should include social policies aimed at increasing sex equality, eliminating poverty, and strengthening social support networks for populations at risk. Future research must focus on cost effectiveness studies of treatments for depression and the identification of protective factors that enable people living in deprived circumstances to remain in good mental health.[38]

We acknowledge the active collaboration of many members of the Department of Psychiatry, University of Zimbabwe, staff of the City of Harare Health Department, traditional healers in the study areas, and staff of ZIMNAMH in the research.

Funding: Beit Medical Trust, IDRC (Canada), the Zimbabwe Ministry of Health, GTZ (Zimbabwe), the University of Zimbabwe, MacArthur Foundation, NORAD (Zimbabwe), Maudsley Mapother Trust, and Royal College of Psychiatrists Eli Lilly Award (UK).

Competing interests: None declared.

1 Abas M, Broadhead J. Mental disorders in the developing world. *BMJ* 1994;308:1052.
2 Patel V, Gwanzura F, Simunyu E, Mann A, Lloyd K. The explanatory models and phenomenology of common mental disorder in Harare, Zimbabwe. *Psychol Med* 1995;25:1191-9.
3 Reeler AP, Williams H, Todd CH. Psychopathology in primary care patients: a four year study in rural and urban settings in Zimbabwe. *Cent Afr J Med* 1993;39:1-7.
4 Abas M, Broadhead J. Depression and anxiety among women in an urban setting in Zimbabwe. *Psychol Med* 1997;27:59-71.
5 Patel V, Pereira J, Mann A. Somatic and psychological models of common mental disorders in India. *Psychol Med* 1998;28:135-43.
6 Araya R, Robert W, Richard L, Lewis G. Psychiatric morbidity in primary health care in Santiago, Chile. Preliminary findings. *Br J Psych* 1994;165:530-2.
7 Swartz L, Ben-Arie O, Teggin A. Subcultural delusions and hallucinations: comments on the present state examination in a multi-cultural context. *Br J Psych* 1985;146 :391-4.
8 Patel V. Recognizing common mental disorders in primary care in African countries: should "mental" be dropped? *Lancet* 1996;347:742-4.
9 Abas M, Broadhead J, Mbape P, Khumalo-Sakatukwa G. Defeating depression in the developing world: a Zimbabwean model. *Br J Psych* 1994;164:293-6.
10 Patel V, Simunyu E, Gwanzura F. Kufungisisa (thinking too much): a Shona idiom for non-psychotic mental illness. *Cent Afr J Med* 1995;41:209-15.
11 Patel V, Todd CH, Winston M, Gwanzura F, Simunyu E, Acuda W, et al. Common mental disorders in primary care in Harare, Zimbabwe: associations and risk factors. *Br J Psychol* 1997;171:60-4.
12 Patel V. *Culture and common mental disorders in Sub-Saharan Africa: studies in primary care in Zimbabwe*. Hove: Psychology Press, 1998.
13 Nations M, Camino L, Walker F. Nerves: folk idiom for anxiety and depression? *Soc Sci Med* 1988;26:1245-59.
14 Lee S, Yu H, Wing Y, Chan C, Lee A, Lee DTS, et al. Psychiatric morbidity and illness experience of primary care patients with chronic fatigue in Hong Kong. *Am J Psych* 2000;157:380-4.
15 Kishore J, Reddaiah V, Kapoor V, Gill J. Characteristics of mental morbidity in a rural primary health centre of Haryana. *Ind J Psych* 1996;38:137-42.
16 Reynolds J, Swartz L. Professional constructions of a "lay" illness; "nerves in a rural coloured" community in South Africa. *Soc Sci Med* 1993;36:657-63.
17 Hall A, Williams H. Hidden psychiatric morbidity: I. A study of prevalence in an out-patient population at Bindura Provincial Hospital. *Cent Afr J Med* 1987;33:239-42.
18 Patel V, Simunyu E, Gwanzura F, Lewis G, Mann A. The Shona symptom questionnaire: the development of an indigenous measure of non-psychotic mental disorder in Harare. *Acta Psych Scand* 1997;95: 469-75.
19 Patel V, Todd CH. The validity of the Shona version of the self report questionnaire (SRQ) and the development of the SRQ8. *Int J Meth Psych Res* 1996;6:153-60.
20 Jacob K, Everitt BS, Patel V, Weich S, Araya R, Lewis G. A comparison of latent variable models of nonpsychotic psychiatric morbidity in four culturally different populations. *Psychol Med* 1998;28:145-52.
21 Goldberg D, Lecrubier Y. Form and frequency of mental disorders across cultures. In: Ustun TB, Sartorius N, eds. *Mental illness in general health care: an international study*. Chichester: Wiley, 1995:323-34.
22 Patel V, Todd CH, Winston M, Gwanzura F, Simunyu E, Acuda SW, et al. The outcome of common mental disorders in Harare, Zimbabwe. *Br J Psych* 1998;172:53-7.
23 Todd C, Patel V, Simunyu E, Gwanzura F, Acuda W, Winston M, et al. The onset of common mental disorders in primary care attenders in Harare, Zimbabwe. *Psychol Med* 1999;29:97-104.
24 Nhiwatiwa S, Patel V, Acuda SW. Predicting postnatal mental disorder with a screening questionnaire: a prospective cohort study from Zimbabwe. *J Epid Comm Health* 1998;52:262-6.
25 Mumford DB, Saeed K, Ahmad I, Latif S, Mubbashar M. Stress and psychiatric disorder in rural Punjab. A community survey. *Br J Psych* 1997;170:473-8.
26 Broadhead J, Abas M. Life events and difficulties and the onset of depression among women in a low-income urban setting in Zimbabwe. *Psychol Med* 1998;28:29-38.
27 Ormel J, DeJong P. On vulnerability to common mental disorders: an evidence-based plea for a developmental perspective. In: Tansella M, Thornicroft G, eds. *Common mental disorders in primary care*. London: Routledge, 1999:34-51.
28 Brown G, Harris T, Hepworth C. Loss, humiliation and entrapment among women developing depression; a patient in non-patient comparison. *Psychol Med* 1995;25:7-21.
29 Patel V, Simunyu E, Gwanzura F. The pathways to primary mental health care in Harare, Zimbabwe. *Soc Psych Psychiatr Epidemiol* 1997;32:97-103.
30 Patel V, Araya R, Lima MS, Ludermir A, Todd C. Women, poverty and common mental disorders in four restructuring societies. *Soc Sci Med* 1999;49:1461-71.
31 Reeler AP. Pathways to psychiatric care in Harare, Zimbabwe. *Cent Afr J Med* 1992;38:1-7.
32 Mynors-Wallis L, Gath D, Lloyd-Thomas A, Tomlinson D. Randomised controlled trial comparing problem solving treatment with amitryptiline and placebo for major depression in primary care. *BMJ* 1995;310:441-5.
33 Coulehan J, Schulberg H, Block M, Madonia M, Rodriguez E. Treating depressed primary care patients improves their physical, mental and the social functioning. *Arch Intern Med* 1997;157:1113-20.
34 Murthy R. Application of interventions in developing countries. In: Jenkins R, Ustun T, eds. *Preventing mental illness*. Chichester: Wiley, 1998:117-30.
35 Reeler AP, Mbape P. A pilot study of a brief form of psychotherapy for survivors of torture. *Torture* 1998;8:120-6.
36 Sumathipala A, Hanwella R, Hewege S, Mann A. Randomised controlled trial of cognitive behaviour therapy for repeated consultations for medically unexplained symptoms: a feasibility study in Sri Lanka. *Psychol Med* 2000;30:747-57.
37 World Health Organization. *Mental disorders in primary care; a WHO education package*. Geneva: WHO, 1998.
38 Patel V. Why we need treatment evidence for common mental disorders in developing countries. *Psychol Med* 2000;30:743-6.

(Accepted 11 October 2000)

Endpiece

Where truth lies

All writers know that the truth *is* in the fiction. That's where the spiritual thermometer gives its reading.

Martin Amis, *All from experience,*
London: Jonathan Cape, 2000