Leonard Cheshire Disability and Inclusive Development Centre,
University College London

Cross-cutting Disability Research Programme

Background Paper: 02

The relationship of Mental illness, poverty and stigma: a study of multidimensional poverty

Key Findings

Stigma and prejudice against persons with mental illness are partly responsible for higher levels and intensity of poverty. Non-disabled individuals surveyed reported widespread beliefs that persons with mental illness cannot work (47%), that children with mental illness cannot participate effectively in school (74.6%) and that women with mental illness (51.2%) are not capable of having and caring for children.

If persons with mental illness are refused the right to attend school and have difficulty in finding and keeping a job, such factors may result in a continuing cycle of lack of opportunities and poverty, compounding low self-esteem and, as a consequence, result in a worsening of mental illness status. Future research should further explore this possible feed-back loop.

Policies fostering opportunities for persons with mental illness while promoting inclusion in the community through advocacy and sensitisation programmes are essential.

Introduction

450 million people worldwide are affected by mental illness. 80% live in middle- and low-income countries. Recent studies report that some 2,320,000 people died in 2010 as a direct result of mental and behavioral impairments, and millions more faced significant social, economic and health barriers as the result of their illness, as did members of their households. (Lozano et al 2012) Globally, mental health conditions account for 13% of the total burden of disease, and 31% of all years lived with disability (WHO, 2010).

Literature shows that people with mental illness in low- and middle- income countries are among the poorest of the poor. In 11 developing-country community-based studies, significant associations between poverty indicators and common mental disorders were found in all but one study (Patel & Kleinman, 2003).

The literature on poverty and disability is growing (Groce et al., 2011; Hosseinpoor et al., 2013), but little has been done to examine the association between mental illness, stigma and various dimensions of

poverty (Ssebunnya et al. 2009), especially in low-income countries.

In this study, the links between severe mental illness, multidimensional poverty and stigma are explored. India was chosen as the field site because the country presents significant stigmatising attitudes towards severe mental illness, especially in rural areas (Jadhav et al., 2007).

While the links between multidimensional poverty and mental illness have begun to be explored (Ngui, Khasakhala, Ndetei, & Roberts, 2010), it is unclear how these factors are interrelated or which is the cause and which the consequences of living with mental illness. This study based in India and was therefore designed specifically to explore deprivation in various dimensions of life.

In the present paper we use the multidimensional poverty measurements introduced by Alkire and Foster (2011). The methodology utilises a dual cut-off criteria, the first cut-off relating to each dimension of poverty separately, and the second across the dimensions.

These allow for comparison of different subgroups of the population, and dimensional monotonicity, i.e. it accounts explicitly for the number of deprivations experienced by those identified as poor.

Alkire, S. and J. Foster, *Counting and multidimensional poverty measurement.* Journal of Public Economics, 2011. 95(7-8): p. 476.

Methodology

Study design and setting

By considering diverse aspects of wellbeing, the present study aimed to identify evidence of differences in poverty between persons diagnosed with mental illness and a comparison group.

Between November 2011 and June 2012, 647 patients were interviewed after being randomly selected during their visit to the Department of Psychiatry of the Dr Ram Manohar Loya (RML) hospital in New Delhi. Because it is extremely difficult, unreliable and expensive to identify individuals with mental illness in the community, patients were selected from a psychiatric outpatient department of a hospital where psychiatric diagnosis was available to identify mental illness.

We focused on individuals diagnosed with either schizophrenia or severe affective disorders. We used a healthy comparison group composed of individuals matching the patients according to gender, age and place of residence, randomly selected from the general population of Delhi.

Procedures

To assess multidimensional poverty, face to face interviews were conducted with all patients or with a care-giver as a proxy respondent. Interviews with the control group were intended to compare the living conditions and coping strategies of patients to those of controls. Respondents were asked about health conditions and accessibility to existing services, education, employment, income, livelihood conditions, and social participation and their responses recorded with pre-designated codes. Instruments were translated into *Hindi* with iterative back-translation methods and tested with a pilot survey in October 2011. Investigators trained 2 experienced supervisors as well as 10 masters level students over two weeks.

Description of dimensions and determination of cutoffs

At the outset of the project, through a thorough and extensive literature review, 17 indicators of poverty that reflected aspects of wellbeing were identified. These indicators were validated for this study through a series of focus group discussions carried out in Dr RML hospital with public health and medical experts, patients and their caregivers. Building on Sen's Capability Approach, we classified the selected indicators into three major domains of deprivation: (1) individual level capabilities; (2) household level material wellbeing; and (3) individual level psychosocial dimensions.

The first domain, individual level capabilities was composed of nine indicators. These included: access to services (healthcare, education and employment); access to secondary school; unemployment, and food security (measured by access to three meals per day). Access to indoor quality air, improved source of drinking water and improved sanitation constituted additional indicators.

We also included a measure of individual income, assuming that some individuals with mental illness are employed or contribute to household income through unpaid assistance in the household.

Domain two, household level material wellbeing is composed of two series of indicators. The first measures household living conditions, based on amount of space in square feet per person, home ownership and living in a home with flooring, walls or roof made of *Kuchcha* (precarious material).

Material wealth was also defined by three complementary indicators: (1) average per capita income based on a monthly household income set at the international poverty line of 1.25 US dollars per day (68 Indian rupees); (2) assets including a list of typical goods owned by the household[1]; and (3) monthly household expenditures[2].

Domain three included psychosocial indicators. Physical safety was selected as it is considered an important factor of vulnerability in the literature. It was measured through perception of unsafe environment. The cut-off was determined during the focus group discussions as living with a feeling of being 'rather unsafe' or 'very unsafe' in the neighborhood in which the respondent lived.

Finally, we included an indicator of political participation to the municipal elections. The absence of participation was considered the cut-off.

Statistical analysis

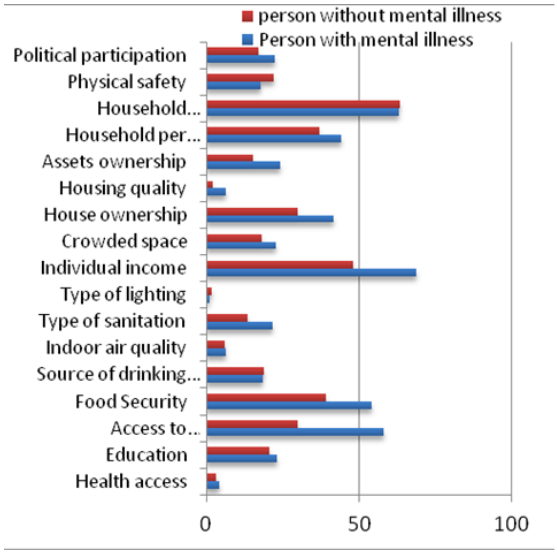
We used a multidimensional poverty measure to identify differences in levels of poverty between patients and controls. Dimensions are independently assessed and the method focuses on dimensional shortfalls. The method allows aggregation of dimensions and offers a class of multidimensional poverty measures.

[1] Assets include: Landline, mobile phones, wooden/steel sleeping cot, mattress, table, clock/watch, charpoy, refrigerator, radio/transistor, electric fan, television, bicycle, computer, moped/scooter/motorcycle, car

[2] Expenditures include: Food, health, school, transportation, savings and personal care products

Findings

Figure 1 Poverty headcount by dimension comparing persons with and without mental illness



Incidence of poverty among persons with and without mental illness

- **High incidence of poverty in New Delhi:** 97.2% of patients and 91.7% of controls are deprived on at least one dimension. On average, persons with mental illness are deprived on 5.2 dimensions (compared to 3.8 dimensions for controls).
- **Higher incidence among persons with mental illness:** The incidence is significantly higher for persons with mental illness, who were less likely to be employed (42.1% versus 70.2%), to have an individual income (31.3% versus 52%), to benefit from food security (45.8% versus 60.9%) and to have house ownership (58.5% versus 70.2%) (see Figure 1).
- **Higher intensity of poverty: Persons with mental illness are worse off than controls whatever the number of dimensions considered (between one and 12).** The difference in deprivation between the two groups is the highest - 69% - if we draw a line at six out of the twelve dimensions of deprivation, to be multidimensionally poor.

Conclusions

- **Stigma** and prejudice against persons with mental illness are partly responsible for higher levels and intensity of multiple deprivations. For instance, there is a widespread belief that persons with mental illness cannot work: we found this to be the case in 47% of the control group. Similarly, 74.6% believed that children with mental illness cannot participate effectively in a regular school. Finally, 51.2% of those surveyed believe women with mental illness are not capable of having and caring for children.

  If these beliefs lead to persons with mental illness have difficulty in finding and keeping a job, or being refused the right to attend school, they may result in a continuing cycle of lack of opportunities and subsequently lead to poverty. In turn, this poverty may compound low self-esteem and as a consequence, result in a worsening of mental illness status. Future research should further explore this possible feed-back loop.

- **Policies fostering opportunities for persons with mental illness, while**

promoting inclusion in the community through advocacy and sensitisation programmes, are essential. The highest needs identified in the present study are access to income generating activities. This entails promoting access to employment through access to credit, including possible adaptations such as establishing quotas in public and private sectors. But of equal importance is changing attitudes through public campaigns and community discussion.

References

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About the Cross-Cutting Disability Research Programme (CCDRP)

The CCDRP is a three year research programme on disability and development funded by the UK Department for International Development (DFID). Based at the Leonard Cheshire Disability and Inclusive Development Centre, Department of Epidemiology, University College London (UCL), the goal of this project has been to generate new understanding of the links between disability and global poverty in mainstream development and health areas where little attention has previously been directed towards persons with disability: maternal and child health, water and sanitation, and agriculture, as well as to better understand issues of access to mental health services in peri-urban communities. Research has been concentrated in five countries: Kenya, Zambia, Uganda, India and Nepal. The programme is also supporting a number of other stakeholders, including disabled people's organisations and local academic institutions to mainstream disability and development research.

The overarching aim of this research has been to contribute to an increase in the effective and sustained social and economic inclusion of disabled people in international development and global health initiatives through the generation of evidence-based research, as well as the capacity building of a range of partners to strengthen mutual understanding around disability inclusion.

For more information about this research, contact ccdrp@ucl.ac.uk

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