

# Integrating Mental Health Interventions with Primary Health Care: An Experience from an Urban Slum of Delhi, India

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## Abstract

**Background:** Mental disorders are common throughout the world. Mental disorders usually not recognized at PHC level lead to unnecessary investigations and treatment, putting a financial burden on patients. This paper describes integration of community mental health services with other services provided at a primary health center (PHC) in an urban slum of Delhi.

**Objectives:** 1) Develop Mental Health Resource Centers with training facilities. 2) Awareness generation, advocacy and stigma reduction. 3) Develop a model of universal mental health program.

**Methods:** This study is a community-based study, carried out over a period of one year from September 2014 to August 2015 at field practice area of the community health department of a tertiary care hospital in Delhi. A mental health resource center was established, under which people of various categories were trained. Awareness generation, advocacy and stigma reduction was done by performing a number of community meetings. A dedicated psychiatric OPD, including psychological counseling, was held biweekly. Community mental health workers (CMHWs) played an important role in fulfilling our objectives.

**Results:** Training of 425 participants was planned and 468 people actually attended the training about common mental ailments. Road shows (4), door-to-door campaign (2), *Jan Sabhas* (45), mental health advocacy seminars (3), etc., were used to generate awareness about mental illnesses. Total of 867 persons attended our psychiatric OPD. 605 (69.7%) were females and 262 (30.25%) were males. Most common mental illness which was encountered was depression (18.45%).

**Conclusion:** Integration of mental health with other dimensions of health is achievable and effective at the Primary Health Care level.

**Keywords:** Primary health care, Community mental health workers, Mental disorders, Integrated health services

## Introduction

WHO has defined health as "a state of complete physical, social, and mental wellbeing and not merely the absence

of disease or infirmity".<sup>1</sup> Nevertheless, our health system is pre-occupied with curative healthcare services for physical ailments, with little attention on mental wellbeing. Mental disorders are prevalent in people of all regions, countries

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and societies. They affect men and women at all stages of life. Contrary to popular belief, the poor are more likely to suffer from mental and behavioral disorders (The World Health Report, 2001) and are more likely to suffer tragic outcomes as a result of their illness.<sup>2</sup>

Majority of patients with CMDs present at primary care centers but end up receiving symptomatic treatments like painkillers and vitamins because their disorders are not recognized by primary care physicians as being mental illnesses. CMDs in such patients lead to chronic disability and progress in severity, making ultimate treatment more difficult.<sup>3</sup> Due to the under-diagnosis of these patients, unnecessary investigations and treatments are offered, which put a heavy financial burden on the patients.<sup>2</sup> World Health Organization estimates that 10% of the world's population has mental disabilities and 1% suffer from severe incapacitating mental disorders.<sup>4</sup>

India has a long history of community mental health initiatives. The Bhore Committee Report of 1946 laid the foundation for the community health movement.<sup>5</sup> The 1970s and 1980s brought more initiatives in mental healthcare and culminated in the National Mental Health Program (NMHP) in India, one of the earliest in the world for substance use and treatment of the ill using the PHC system.<sup>6</sup>

The National Mental Health Program was developed in India to address the problem of mental illnesses, especially in rural areas. However, it has come under some criticism as it has laid emphasis on identifying and treating severe mental disorders such as psychosis, while not addressing common mental disorders (CMDs), which are equally disabling. CMDs, which are neurotic disorders presenting with anxiety and depressive symptoms, are widespread and are known to cause significant disability worldwide.<sup>2</sup> In India, prevalence rates of CMDs ranges from 2% to 57%.<sup>7</sup>

A variety of lacunae in the current implementation of NMHP have been reported. These include: i) absence of full-time program officer for NMHP in many states; ii) inadequacies in the training for PHC personnel; iii) inadequate record maintenance; iv) non-availability of basic information about patients undergoing treatment at various centers (regularity of treatment, outcome of treatment, drop-out rates, etc.); v) difficulties in recruitment and retention of mental health professionals in the DMHP; vi) non-involvement of the non-governmental organizations (NGO) and the private sector; vii) inadequate mental health educational and community awareness activities; viii) absence of program outcome indicators and monitoring; and ix) inadequate technical support from mental health experts.<sup>8</sup>

Community mental health care programs imply that all mental health and well-being needs of the community are met in the community, using community resources and the

primary healthcare (PHC) system. It goes much beyond only treatment and includes: promotion of well-being and mental health promotion, stigma removal, psychosocial support, rehabilitation of those in need, prevention of harm from alcohol and substance abuse.<sup>9</sup>

This paper describes the integration of mental health services with other services at a primary health level, i.e., in an urban slum of north east Delhi. This initiative was a collaborative effort between the Departments of Community Medicine and psychiatry of St. Stephens Hospital, Delhi. For achieving this, following objectives were set:

- Developing a mental health resource center with training facilities
- Awareness generation, advocacy and stigma reduction in the community
- Developing a model of universal mental health program

## Materials and Methods

### Study Design

Our study is a community-based interventional study, which was carried out over a period of one year from August 2014 to August 2015 at the field practice area of the community health department of a tertiary care hospital in Delhi.

### Study Area

The study was carried out in an urban slum situated in northeast district of Delhi. It has a population of about 70,000 (departmental MIS). It consists of 18 blocks with around 11,000 households. About 30% of the population is migrant and, therefore, is not permanent resident of the study area. They are also the most vulnerable to mental disorders as they are living away from their homes and have little or no social support and often are not conversant with the ways of city life. As they tend to live in the area very initially when they come to Delhi and move to better areas once they get settled in good jobs, etc., it was a challenge to get these people into the fold. Also, rampant stigma surrounding mental health issues caused even the permanent residents to shy away from utilizing the mental health services being provided at many hospitals in Delhi.

### Study Participants and Sample Size

All people residing in the community were included in the intervention.

### Study Methodology

To achieve the aim of integrating mental health services with the already-existing primary healthcare services being provided, a multi-pronged approach was adopted. Firstly, a situation analysis was done by surveying the entire population of the study area to find out the prevalence

of unrecognized mental illnesses in the area. Also various activities were undertaken to reduce the stigma and discrimination surrounding mental illnesses. They have been described in detail below.

### Community Mental Health Workers

The back bone of this intervention was development of community mental health workers (CMHWs). For this, 15 volunteers were recruited from the community itself.

They were selected according to the following criteria:

- Member of the same community
- Having at least secondary school education
- Good communication skill
- The job responsibilities of a CMHW included:
  - To recognize the patients in the community who need psychiatric help, through house visits.
  - To refer the identified patients and get them to the psychiatric clinic community health department
  - To Respond to their specific needs and do appropriate counseling
  - To follow up the patients seen in the psychiatric clinic

These volunteers were paid a monthly honorarium of Rs. 2000 for their part-time community work of 2-3 hours daily for 6 days in a week.

Once recruited, these community mental health workers were imparted an intensive 7 days training of 3-4 hours duration. The training covered almost all the major aspects of mental health issues along with the capacity building in mental health first aid and counseling skills.

Each CMHW was assigned one block (approximately 650 households) except for three who were given two smaller blocks each and were supervised by the concerned auxiliary nurse midwife of that area. The overall supervision and follow up of the activities was done by senior LHVs. Community health department has six ANMs, each covering three blocks. Each ANM supervised the work of 2 to 3 CMHWs. ANMs were also given training about relevant issues for 2 days at CHD.

These workers conducted daily door-to-door visits for generating awareness about common mental health diseases, and identified patients with symptoms of mental health disorders who were then counseled and encouraged to attend the psychiatric OPDs at the community health department. After clinical evaluation, the patients were followed up in their homes for encouraging compliance of medication and subsequent visits.

### Situation Analysis: Community Mental Health Survey

A cross-sectional study was done at the beginning of

the intervention to screen for mental illnesses in the community. This was done to understand the burden of these illnesses in the study community. A structured questionnaire was developed in collaboration with Saarthak, an NGO working in the field of mental health in Delhi. It had questions related to various symptoms of mental illnesses and affirmative answer to presence of any symptom was taken as suggestive of that disease and requiring further evaluation by the psychiatrist. One adult from each household was interviewed, and all households of the community were included in the study. The exclusion criteria was house found locked in three visits or absence of an adult in the house at the time of survey in three visits.

### Development of Mental Health Resource Centre

Under the project, we organized regular training sessions for various categories of health workers. A standardized and structured training module was used for the training activities. The duration of the training was different for different categories of health workers. The training sessions were taken by the public health and mental health experts. All the participants were administered a pre-test and post-test in the beginning and at the end of the training in order to assess and evaluate the quality of trainings. The training covered all the important mental health aspects like understanding mental health, symptoms of common and severe mental disorders, mental health first aid, counseling skills, etc. The training sessions were complemented with role plays and case studies for better understanding the different mental health contexts and approach to mental disorders. The specific sessions were planned to enhance and improve the problem-solving skills and responding to patients in crisis situations. Manual and audiovisual training materials were used for the sessions. Thus training helped them to identify the cases, implementation of simple intervention strategies, working closely with families of the mentally ill, and making appropriate referrals.

### Awareness Generation and Stigma Reduction

The awareness-building program included road shows, Jan sabhas (community meetings), Nukkad natak (street plays), mental health advocacy seminars, door-to-door campaign, Bal panchayats (children's groups) and women's group formation, pamphlets, posters, letters and booklet distribution containing all information related to, and meeting the needs of people with mental ailment in the catchment area of study. CMHWs play an important role in achieving this objective. Each Nukkad natak (street play) was followed up by a public lecture and health talk by a health professional covering important mental health issues.

The following aspects of mental health were covered under various awareness generation events:

- Importance and role of mental health in life and daily

activities

- Breaking down myths on mental illness
- Words, comments, and body language can be stigmatizing
- Avoid calling them names; use their name instead
- Try not to blame or to demoralize mentally ill persons by saying that they have ruined their life

### Common symptoms

- Lack of interest and/or difficulty in completing daily activities
- Low social interaction
- Sudden changes in behavior
- Unexplained movement of hands and legs
- Excessive fear or phobias
- Inability to sleep well
- Treatment is possible for mental illness
- Seek treatment from a qualified practitioner and not a traditional healer
- Availability of treatment in the community health department
- What people understand by 'stigma' and saying no to stigma
- Loving and supporting persons living with mental illness in society

### Other Entry Points

#### General OPD

The primary health center in the study community runs a

general OPD for the people of the community. It provides free consultation and medicines along with few basic lab tests at nominal charges to the community. The average daily OPD attendance was around 200–250 patients per day. Doctors posted in these OPDs were trained over a period of 7 days, by a team of a psychiatrist and a clinical psychologist to recognize symptoms suggestive of mental illnesses for timely referral.

#### Mahila Mandals

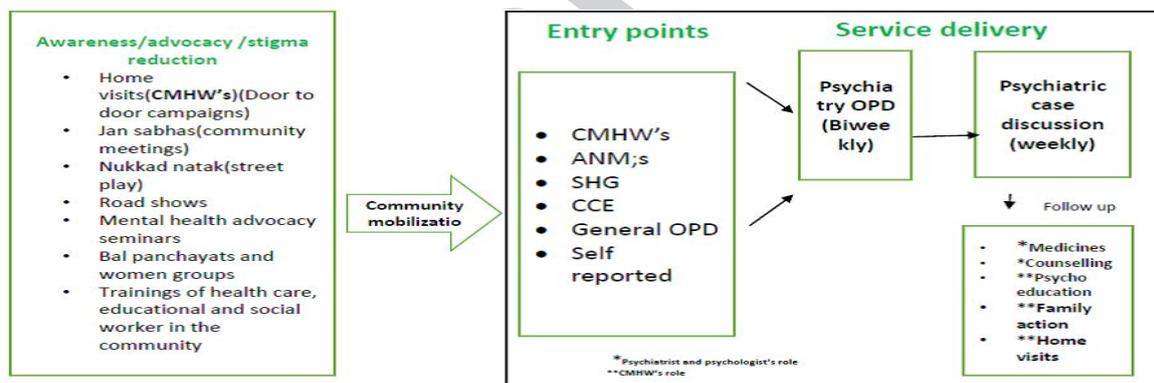
Mahila Mandals are self-dependent organizations of 15–16 women in the age group of 20–45 years. The priority is given to the women with strong leadership skill. The community mental health worker also served as an link between RCH unit, social unit and mahila mandals. These mahila mandals help CMHW identify the patients in the community, who need mental health services

#### Child Volunteers

A few Bal Panchayat groups in the different areas of the Sunder Nagri community were formed. Regular meetings, rallies and activities involving awareness on mental illness, child rights, personal hygiene and sensitization in environment-related activities like plantation, etc., in community were done.

#### Self Reported

Few patients reported to the Psychiatry OPD on their own as the awareness increased in the community.



Model of integrating mental health care with primary health care

\*psychiatrist and psychologist role, \*\*CMHWs and ANMs role

Figure 1. Framework for Integrating Mental Healthcare with Primary Healthcare

### Mental Health Services

#### Psychiatric OPDs and Psychology Clinics

Under the project, a special Psychiatric OPD was run twice weekly. Patients were examined and seen by the psychiatrist and provision for dispensing psychiatric medicines was also established by the hospital. Clinical psychologist saw the patients and provided counseling and guidance accordingly.

A regular follow up of all the patients was done by the field team (ANMs and community mental health workers). Patients were followed up at home for compliance of medicines prescribed, psycho-education, family action and vocational rehabilitation accordingly.

#### Statistical Analysis

The results of the situation analysis survey were presented

as proportions of households having a family member with symptoms of mental illness. Other outcome variables for activities undertaken were OPD attendance, age, sex and diagnosis-wise distribution of patients (expressed as proportions) and number of trainings held for different groups of study participants.

### Ethical Clearance

This study was approved by the Institutional Review Board. Informed verbal consent was taken from all participants. Confidentiality of data was ensured.

## Results

### Survey

Early on in the project situation analysis was done, a survey of the whole community was done to ascertain the burden of unrecognized mental illnesses in the community.

Total households that were surveyed were 9556, out of

which 2905 (30.39%) belonged to joint families and 6651 (69.60%) were nuclear families. Average family size was 5.6.

When the respondents were asked about any member with mental ailments, total households were found to be 201 (2.11%). When symptom-specific questions were asked, households with people showing symptoms of addiction were 1337 (36.63%), anxiety 3223 (33.72%), somatoform disorders 1161 (12.14%), depression 511 (5.34%), OCD 499 (5.22%), MR 400 (4.18%), mania 322 (3.36%), and schizophrenia (1.66 %).

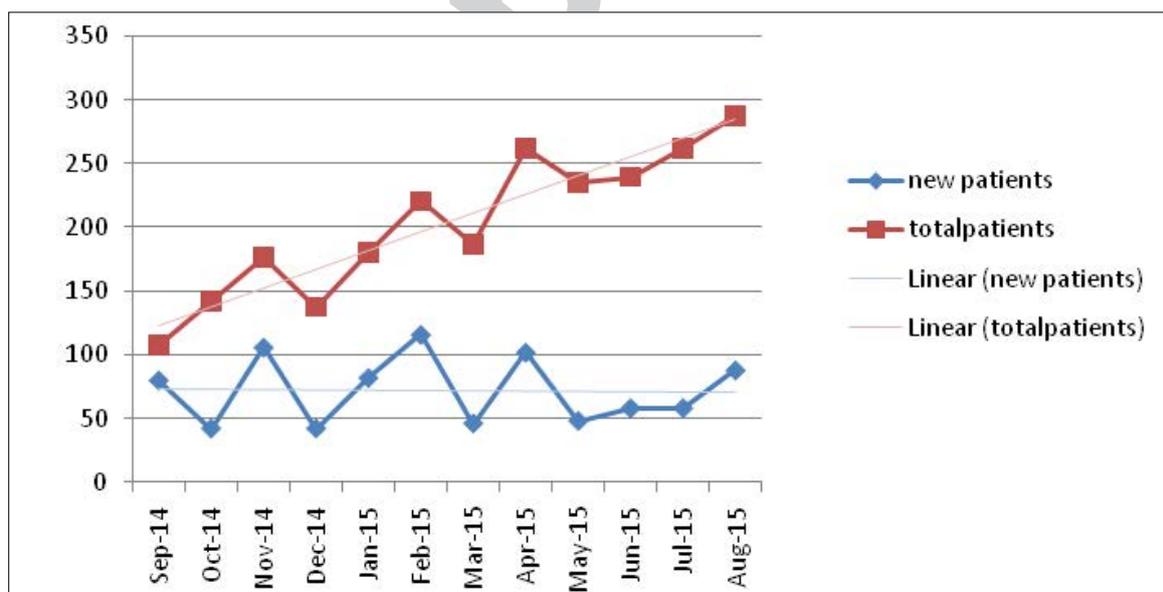
### Output Variables

#### OPD Patients

Total number of patients attending the psychiatric OPD from September 2014 to August 2015 was 868. Out of this, 603, i.e., 69.47% were females and 265 (30.52%) were males. Of the total patients attending the clinic, 803 (92.5%) were from the study area. Others had come from surrounding areas after hearing about the service.

**Table 1. Age-Wise Distribution of Patients Attending the Psychiatric OPD from September 2014 to August 2015**

Age Group (Years)	Number of Patients (Sep 2014–Aug 2015)
0–10	54 (6.22%)
10–20	185 (21.31%)
20–30	175 (20.16%)
30–40	176 (20.27%)
40–50	126 (14.51%)
50–60	86 (9.90%)
>=60	66 (7.60%)
Total	868



**Figure 2. Monthly trend of new and total patients presenting to O.P.D. during the study period (September 2014 to August 2015)**

### Diagnostic Profile

Patients with CMD formed the majority of those who visited the clinic as compared to those with severe mental disorders. Mild depressive disorder was the common mental

ailment among the people attending the psychiatric clinic, i.e., about 18.45%, followed by headache and dysthymia. About 3.9% attending the clinic were diagnosed with schizophrenia and 1.4% with bipolar disorder, which are severe mental health disorders.

**Table 2. Distribution of patients according to their diagnosis (Psychiatry clinic OPD data 2014-15).**

S. No.	Diagnosis	Frequency	Percentage
1	Depressive disorder	161	18.54
2	Headache	149	17.16
3	Dysthymia	125	14.40
4	IQ/MR/Clinically Mild/Intellectual disability	76	8.75
5	Anxiety	71	8.17
6	Adj. disorder	50	5.76
7	Migraine	45	5.18
8	ADS/NDS	39	4.49
9	Seizure disorder	38	4.37
10	Schizophrenia	34	3.91
11	Panic disorder	23	2.64
12	Conduct disorder	15	1.72
13	Bipolar Disorder	13	1.49
14	OCD	11	1.26
15	Mania	8	0.92
16	Phobia	7	0.80
17	Nocturia	3	0.34
18	Total	868	100

**Table 3. Number of Trainings Targeted and Achieved during the Project Time Period**

S. No.	Category	Annual Target	Target Achieved
1	Community medicine doctors/general practitioners and family physicians	40	38
2	Community Mental Health Workers/ASHA workers, ANMs, LHVs, rescue team, communication team	100	105
3	Nursing students	100	102
4	Counselors	20	19
5	Social workers, NGO workers	50	59
6	School teachers	50	67
7	Home-care workers	50	39
8	Special educators	15	39
Total		425	468

### Mental Health Resource Center

Trainings of people from various fields were carried out for different duration of time for various people ranging from 1 day to 7 days of training

### Stigma Reduction

A Focus Group Discussion was undertaken. Relatives of newly diagnosed patients participated. 60% of the people participating in FGD came to know about mental health

problems and services available from community mental health workers followed by ANMs. Nukkad nataks (70%) were found to be very effective in spreading the awareness regarding mental illnesses and in stigma reduction.

### Discussion

Our study was carried out in a slum area in the northeast Delhi with majority of people belonging to lower socio-economic class. In our study, the respondents whose

families were found to have a known case of mental ailment were 201 (2.11%). The proportion of families with probable mental illness in family was higher. In a study by Sahu in Habra district, 12.59% respondents were reported to have a person with mental illness in their own family.<sup>9</sup>

868 new patients attended the psychiatric clinic in the one-year study period. Out of this, 603, i.e., 69.47% were females and 265 (30.52%) were males. According to our study, majority of patients from the productive age group, i.e., 20 to 40 years constituted about 40 % of patients. In an Indian study by Isaacs et al. of the 242 patients who were registered, 176 (73%) were females and 66 (27%) were males and most of them were in the age group 21–40 years.<sup>3</sup> In another study by Kumari et al. in Jharkhand, the total number of patients who attended the psychiatric clinic was 3026, among whom 1855 (61.30%) were males and 823 (27.19%) were females.<sup>2</sup>

In our study, of the total patients attending the clinic 803 (92.5%) were from the study area. In another study on initiating community mental health in rural area by Isaacs et al., of the 242 patients who were registered, only 212 (87%) were from the surveyed area.<sup>3</sup>

In our study, depression was the most common mental ailment encountered, i.e., in 161 (18.54%) patients. In another similar study by Sahu in Habra district, it was found to be in 81 (33.55%) patients.<sup>2</sup>

The main objective of the National Mental Health Program, i.e., minimum mental healthcare to be made accessible, available and affordable to the underprivileged was achieved by our project to some extent. It is integrated with primary healthcare services and it involves community involvement through the community mental health workers. Different strategies were used, which included training of lay community health workers and of healthcare personnel at the primary healthcare level, clinical services, public awareness and stigma reduction campaigns and follow up to improve compliance through lay community workers. The need for improved access to mental health services in low- and middle-income countries has been strongly argued since long.<sup>10</sup> “Treatment Gap,” i.e., the gap between availability and need of mental health services has been estimated to exceed 75% in developing countries<sup>10</sup>. To bridge this gap, a rational re-distribution of mental health services known as “task sharing and task shifting” from specialist mental health professionals to non-specialist health workers in the primary healthcare and community setting has been proposed<sup>10</sup>. The scarcity and inequality in the distribution of mental health professionals makes this even more important<sup>10</sup>. A Cochrane review summarizing this body of research indicates that task-sharing mental healthcare in LMICs may improve clinical outcomes for depressive disorders, post-traumatic stress

disorders, alcohol use disorders, and dementia, and may be cost-effective. Our study also adds to evidence that such interventions work very well in improving awareness and acceptability of mental healthcare services in the community. By having mental healthcare services based at the primary health center, stigma also reduces and patients seek care more readily, as seen by increasing numbers of total patients (new and follow up) and steady rate of new patients coming to the OPD.

A systematic review of 15 controlled interventional studies has shown that using lay health workers (LHWs) in mental health programs is feasible and effective<sup>11</sup>. Their role in providing psychological and psychosocial support to patients cannot be understated. The most common mode of providing these interventions was through home visits. Similarly, in our study, community mental health workers formed the backbone of our intervention. Their role was to identify probable patients, refer them to the specialist, and ensure compliance through follow-up home visits. They helped to increase awareness in the community and reduce stigma related to mental illnesses. As they were from the same community, their acceptability was high. Keeping the community involved by organizing many community meetings, road shows, and Nukkad natak helped to improve the utilization of services.

Therefore, we can see that common mental disorders form a large proportion of the total burden of mental illnesses and must be addressed in all mental health programs. The involvement of community health workers can improve utilization of services. However, such initiatives will not be sustainable unless the community members are involved with the program right from its beginning. Training of healthcare personnel at the primary healthcare facilities aimed to meet the NMHP objective of integrating mental healthcare with primary healthcare. Innovative programs such as this are definite steps towards achieving Universal “Health for All” and can be developed by community participation.

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**Conflict of Interest:** None

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