

Comparative Study of Burden in Caregivers of Patients with Schizophrenia and Depression

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Abstract:

If there are shortcomings in the community-based mental health systems, the family members must undertake additional responsibilities and tasks. Over the past 2 decades, the responsibility of providing care and assistance to persons with mental illness has

increasingly befallen upon the family members. Many caregivers of a person with mental illness suffer from ongoing distress whereas professionals tend to underestimate family burden. . Of all the burdens, emotional burden is the most pervasive negative consequence of care giving. Various dimensions of perceived burden affect the psychological well-being of the caregivers, thereby, highlighting the distinct need to explore and understand the extent and nature of burden experienced by the caregivers of chronic mentally ill patients and to provide appropriate interventions to improve the Quality of Life of the patient and the caretaker. This study attempts to compare caregiver burden in caregivers for depression and schizophrenia and at the same time tries to explore the determinants of the resultant burden. A total of 100 primary caregivers and patients who regularly accompanied patients for OPD follow ups for a diagnosis of schizophrenia or depression as per ICD-10 criteria were interviewed over a period of 18 months. It was observed that the primary care givers in case of schizophrenia group were mostly parents (39% vs. 17%) and in case of depressive disorders caregivers were mostly spouses (60% vs. 34%), which was found to be statistically significant. It was observed that all types of burden scores (both subjective and objective) significantly higher in caregivers of schizophrenia group as compared to that of depression except scores of burdens due to effect on physical health of caregiver.

Introduction:

“Carers, as a group, work 24 hours a day, 7 days a week, 365 days of the year. They do not get shift allowance. They do not get recreational leave, and they certainly do not get long-service leave. They have got a huge responsibility and there have not been appropriate resources applied to their support.”[1]

Over the past 2 decades, the responsibility of providing care and assistance to persons with mental illness has increasingly befallen upon the family members. There has been a positive trend of reduced hospital stays, lower number of inpatient beds and a shift towards community-based mental health services. If there are shortcomings in the community-based mental health systems, the family members must undertake additional responsibilities and tasks [2]

The approaches to care of individuals with mental disorders have reflected the attitude of the community towards the ill persons. Till 17th century they were equated with being ‘BAD’ and this led to them being kept in jails along with criminals. The next phase saw the emergence of view that they are ‘MAD’ and thus require protection and care. This was the predominant view of the 18th and 19th centuries. This resulted in setting up of large number of asylums. The advent of psychopharmacological agents in 20th century led to large number of mentally ill patients in the community. It is the period in which emphasis shifted from diagnosis to understanding the needs of the individuals and families. A reflection of this shift is the studies of disability and family burden during this period [3]

Care giving becomes burdensome & hazardous if patient is suffering from chronic mental illness. Many caregivers of a person with mental illness suffer from ongoing distress whereas professionals tend to underestimate family burden [4]

“Family burden” is a frequently used term to describe the impact of mental illness on families of the patients. The world has 4 kinds of people: those who have been caregivers, the who are currently caregivers, those who will be caregivers and those who need caregivers. Of all the burdens, emotional burden is the most pervasive negative consequence of care giving.

Parameters used to describe emotional burden include feelings of anxiety, symptoms of depression, emotional exhaustion, lowered morale, and helplessness [5]

The presence of mentally ill person in family could affect various aspects of family ranging from financial, interpersonal relationships, family leisure time activities to stigmatization and eventual social isolation in community. Family members are likely to experience guilt, anger and shame over patient's behavior and, no matter how supportive family members are, the burden experienced is likely to be substantial and can diminish their quality of life [6]. A major source of support for the mentally ill in India is family. Even with an apparent downfall of a traditional family structure, more than 60% of patients with long term schizophrenia live with primary caretaker [7]. Indians show great resilience in caring for their mentally ill relatives, they experience distress in both, physical and emotional forms [8].

Several approaches have been used to measure family burden. [9]. made a distinction between subjective and objective burden. Objective burden is related to the psychological reactions of the caregivers, such as feelings of loss, embarrassment in social situations, and anxiety [10]. It refers to impact of the behavior of the patient and the consequences that ensue on the caregiver's health, leisure activities and financial expenditures [11].

Although, giving care and receiving it can occur at any stage of life, it is usually associated with chronic or debilitating illnesses that lead to poorer functioning and loss of independence. Family burden can help in predicting satisfaction with the mental health services. Various dimensions of perceived burden affect the psychological well-being of the caregivers, thereby, highlighting the distinct need to explore and understand the extent and nature of burden experienced by the caregivers of chronic mentally ill patients and to provide appropriate interventions to improve the Quality of Life of the patient and the caretaker.

There is an important and yet, complex relationship between the perceived burden of care and the coping styles of a caregiver. This is because caregivers report subjective burden. This subjectivity in perceived burden is due to the coping styles and appraisal of the conditions of the patients and the caregivers, rather than the illness itself [12]. The breakdown in reciprocal arrangements in interpersonal relationships in families of patients with psychiatric illness, such that one person is doing "more than their fair share" leads to experience of substantial burden in families of psychiatric patients [13].

Need for the study

The burden on caregivers has been studied extensively in some chronic or severe mental illnesses such as Schizophrenia. These studies concluded that illness variables and personal characteristics of the caregivers such as coping skills, significantly affect the burden on the caregiver. However, there is a paucity of research on caregiver burden in other mental conditions such as Affective disorders and substance use disorders.

This study attempts to compare caregiver burden in caregivers for depression and schizophrenia and at the same time tries to explore the determinants of the resultant burden. Based on the need, A study was conducted which aimed at assessing the amount of subjective and objective burden experienced by primary caretakers of patients with Schizophrenia and depression and to compare the burden that a primary caretaker endures while caring for patients with diagnosis of Schizophrenia and depression and its relation with various socio-demographic correlates.

Material and methods:

Study Setting

It is a clinical, instrument rated, cross-sectional study which was conducted at a Psychiatry out-patient department of a hospital attached to a medical college based in rural India.

A total of 100 primary caregivers and patients who regularly accompanied patients for OPD follow ups for a diagnosis of schizophrenia or depression as per ICD-10 criteria were interviewed over a period of 18 months. The caregivers and the patients were explained about the study in detail and a written informed consent was obtained for the same. The participants were informed they could withdraw consent anytime. Before starting the study, approval for this study was obtained from the Institute Ethics Committee. Written informed consent was obtained from the patients and /or their relatives Confidentiality of the information provided was maintained.

To be eligible for the study, patients fulfilling the following criteria were taken: -

To be eligible for the study, the patients will have to fulfill all the following:

1. Inclusion criteria

- a) Patients of between the age of 15-70 years of both the sexes.
- b) Those patients and /or accompanying relatives willing to give written informed consent regarding participation in study.
- c) Patients who fulfill diagnostic criteria laid down for schizophrenia and depressive episode [14]
- d) Duration of illness should be more than one month.
- e) Those patients whose caregivers fulfill criteria of primary care takers [15]

2. Exclusion criteria

- a) Non availability of primary caregivers.
- b) Depression in patients as a part of bipolar mood disorder.
- c) Patients having co-morbid physical or any psychiatric disorder.
- d) Patients &/ or attendants not giving written informed consent.
- e) Any chronic mental / physical illness in some other family member.
- f) Patients &/ or Care Givers not able to communicate verbally.

To be eligible for the study, the caregivers of the patients fulfilling the following criteria were taken: -

1. Age > 18 years
2. Caregivers who fulfill **Pollak and Perlick** criteria.

Data Collection

Detailed history of patients attending psychiatry OPD during investigator's OPD days was taken and the patients fulfilling ICD-10 criteria for schizophrenia and depression was sorted out. Then patients whose relatives or caregivers were fulfilling criteria for primary care giver according to Pollak and Perlick method were identified and such consecutive 100 patients from each group i.e. schizophrenia and depression were included in the study.

The data was collected on a semi structured Performa to obtain the details of:

1. Identification data
2. Socio demographic profile
3. Score of burden on caregivers

The following instruments were used for assessment.

1. ICD -10 Classification of Schizophrenia and depression [14]
2. Pollak & Perlick method to identify primary caregiver [15]
3. A detailed diagnostic interview with a self prepared semi structured Performa.
4. Family Burden Interview Schedule [16]

Results :

The socio demographic characteristics of the participants are as follows: -

It was observed that majority of patients in Schizophrenia group were males (56%) as compared to Depression group, where majority were females (67%). It was also found to be statistically significant.

It was observed that the distribution of patients in both groups i.e. Schizophrenia and Depression was similar in defined age groups except 25-34 yrs. age group where Schizophrenia outnumbers the Depression. The distribution in all these age groups was not statistically significant.

Table 1- Diagnosis and current marital status

MARITAL STATUS	SCHIZOPHRENIA	DEPRESSION	TOTAL	CHI ² = 12.87 P VALUE= 0.005 (<0.05)
Never married	34 (34%)	13 (13%)	47	
Married	57 (57%)	78 (78%)	135	
Widow(er)	4 (4%)	5 (5%)	9	
Divorced/ separated	5 (5%)	4 (4%)	9	
Total	100	100	200	

It was observed that 34 % of total patients with diagnosis of schizophrenia were unmarried as compared to 13 % in case of depression which was statistically significant. There was no significant difference in case of divorcees or widow(er)s when compared in both diagnosis under consideration (**Table 1**).

The majority of patients were of Hindu religion (75 %). 20% were of Buddhist religion and about 5% were Muslims. There was no statistical difference between two groups when religion of the patients was compared

It was observed that about 12.5% of total patients were illiterate, 28% were educated upto middle school, 31% were secondary school educated, 15% were educated upto senior secondary, 10.5% graduates and 3% were postgraduates. There was no statistically significant difference in these two groups of schizophrenia and depression.

It was observed that many patients with Schizophrenia were unemployed as compared to patients with Depression (34% vs. 8%), which was statistically significant. Most patients in depression group were doing household chores compared to Schizophrenia group (28% vs. 15%). For rest of occupational groups, there was no statistically significant difference.

Table 2- Diagnosis and Domicile

AREA	SCHIZOPHRENIA	DEPRESSION	TOTAL	$\text{CHI}^2 = 0.2581$ P VALUE= 0.611 (> 0.05)
Rural	76 (76%)	79 (79%)	155	
Urban	24 (24%)	21 (21%)	45	
Total	100	100	200	

Majority of patients in the sample were from rural area (77.5%) than urban area (22.5%). There was no significant difference in the domicile of both the groups (**Table 2**)

Table 3 - Diagnosis and Family type

FAMILY TYPE	SCHIZOPHRENIA	DEPRESSION	TOTAL	$\text{CHI}^2 = 12.05$ P VALUE= 0.001 (< 0.05)
Joint	7 (7%)	25 (25%)	32	
Nuclear	93 (93%)	75 (75%)	168	
Total	100	100	200	

Patients from schizophrenia group were living mostly in nuclear families as compared to depression group (93% vs. 75%) which was statistically significant. The overall trend was more of nuclear family than joint one (84% vs. 16%) which was also significant (**Table 3**)

Table 4- Diagnosis & Caregiver relationship

RELATIONSHIP	SCHIZOPHRENIA	DEPRESSION	TOTAL	$\text{CHI}^2 = 19.31$ P VALUE< 0.05
Spouse	34 (34%)	60 (60%)	94	
Children	12 (12%)	16 (16%)	28	
Parents	39 (39%)	17 (17%)	56	

Others	15 (15%)	7 (7%)	22	
Total	100	100	200	

It was observed that the primary care givers in case of schizophrenia group were mostly parents (39% vs. 17%) and in case of depressive disorders caregivers were mostly spouses (60% vs. 34%), which was found to be statistically significant. For categories like children and others as caregivers, there was no significant difference between these two groups (Table 4).

Diagnosis and caregiver burden

The statistical data showing various objective burdens is as follows-

Table 5- Overall scores of various dimensions of caregivers' burden

Objective Burdens		Mean score (Standard deviation)		P value
		Schizophrenia	Depression	
1	Financial burden	8.34 (2.28)	4.51 (1.95)	<0.05
2	Effect on family routine	7.65 (2.23)	3.47 (1.76)	<0.05
3	Effect on leisure activities	5.32 (1.99)	2.04 (1.44)	<0.05
4	Effect on social relations of family members	5.55 (2.5)	2.04 (1.42)	<0.05
5	Effect on physical health of family	0.16 (0.631)	0.06 (0.312)	0.0786
6	Effect on psychological health of family members	1.78 (0.785)	1.21 (0.795)	<0.05
7	Comparison of total scores vs. diagnosis	28.8 (6.85)	13.33 (4.80)	<0.05
Subjective Burden		Mean score (Standard deviation)		P

		Schizophrenia	Schizophrenia	value
1	Subjective burden on caregivers	1.73 (0.39)	0.98 (0.42)	<0.05

It was observed that all types of burden scores (both subjective and objective) significantly higher in caregivers of schizophrenia group as compared to that of depression except scores of burdens due to effect on physical health of caregivers. This Chart depicts the range of various burdens and comparison between the two groups (**Chart 1, 2&Table 5**).

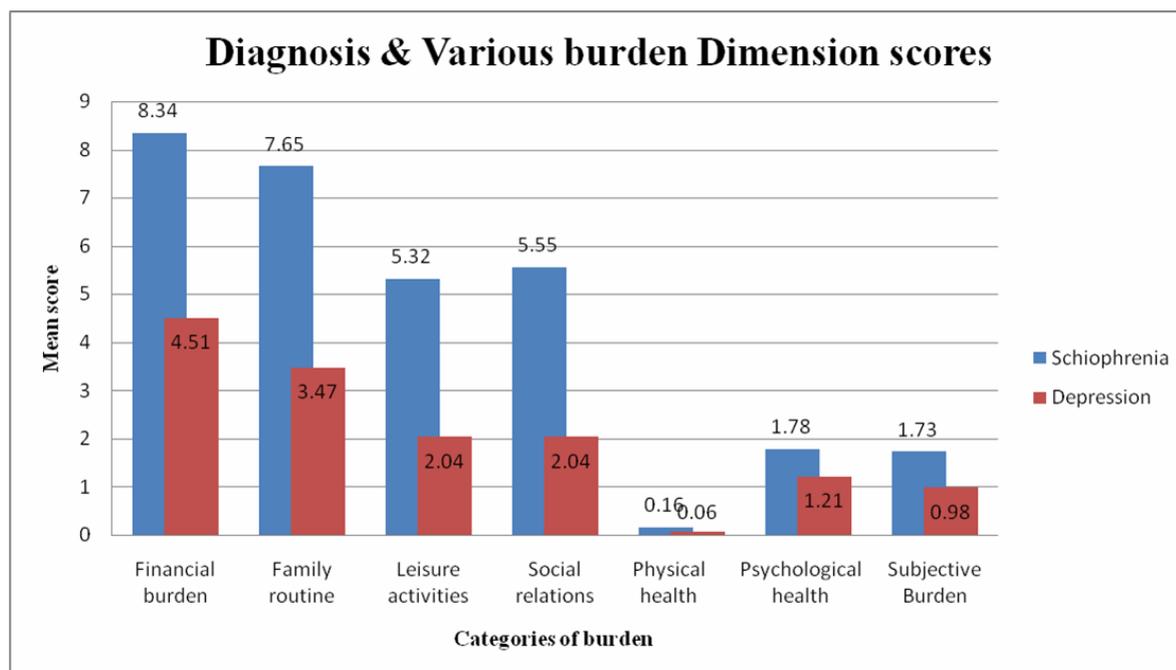


Chart -1

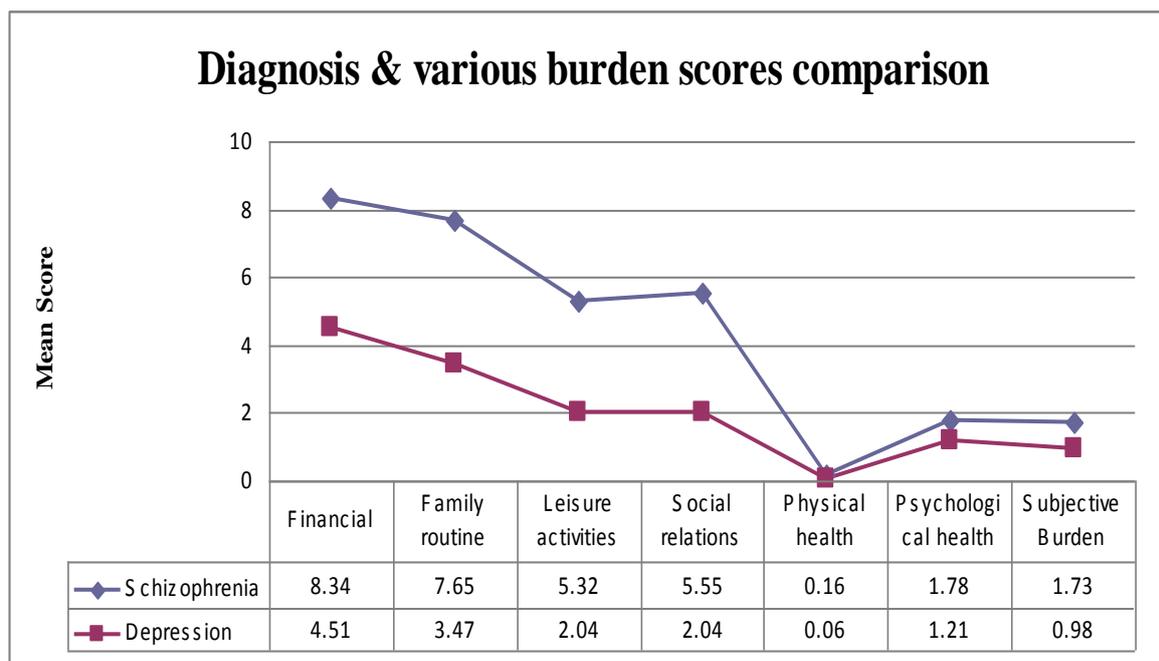


Chart 2

Discussion:

In this study, the investigator mainly tried to assess the illness burden on key family members i.e. caregivers, under six subscales viz. financial burden, effect on family routine, effect on leisure activities, effect on social relations of family, effect on physical health of family members and effect on psychological health of family members. Attempts were made to assess socio- demographic variables in relation to illness cohort i.e. either Schizophrenia or Depression and comparison between the two groups was made. Other important dimensions of burden like debt, social isolation of family, caregivers’ unemployment was also assessed and comparison was done between the two groups i.e. Schizophrenia and Depression.

It was observed that there is a predominant distribution of males in Schizophrenia group where as females were dominating the Depression cohort. Overall prevalence of Schizophrenia is same in men and women whereas depression is more prevalent in females than males [17]. An almost universal observation, independent of country or culture, there is two-fold greater prevalence of depression in females than males. Similar finding was seen in study of [18]. Findings of present study were also consistent with this observation.

There was not much difference in age distribution of patients when compared within two groups. It was observed that the ratio of never married patients in Schizophrenia cohort was almost three times as compared to Depression cohort (34% vs. 13%). This difference may be due to the fact that the mean age of onset is teenage group or early 20s in case of Schizophrenia as compared to depression in which, age of onset is in 30s or 40s. Hence the majority of patients in Schizophrenia illness don’t get married whereas patients with

depressive illness marry before the illness onset. The number of separated or divorced patients is very less in our study. This trend may be due to our social & cultural values where marital bond is strong. This trend is almost opposite in various western studies where we can see large number of mentally ill patients either divorced or separated. A similar study concluded that depressed patients as a whole had a divorce rate nine times the expected rate for the population. Couples in which both members were ill had a significantly higher divorce rate than couples in which only one member was affected [19]. There was no significant difference statistically when marital status was compared in two cohorts i.e. Schizophrenia & depression in our study.

This study didn't find any difference when the religion of patients of both cohorts was compared.

Regarding educational qualification, it was observed that about 12.5% of total patients were illiterate, 28% were educated upto middle school, 31% were secondary school educated, 15% were educated upto senior secondary, 10.5% were graduates and 3% were postgraduates. There was no significant difference between the two groups i.e. Depression and Schizophrenia.

As far effect on employment of patients is concerned, it was observed that about 33% patients in Schizophrenia group were unemployed as compared to 8% in Depression cohort, whereas number of patients doing household chores is significantly high in Depression group (28% vs. 15%). For other occupations like farming & agriculture work, daily laborers, skilled workers and others, the distribution was almost similar in these two groups.

Majority of patients in the sample were from rural area (77.5%) as compared to urban area (22.5%). This may be due to the fact that the study was conducted in a medical college based in rural area and the majority of patients coming to the hospital are from rural areas. These findings for Depression group are also not consistent with that of literature that depressive disorder occurs more in rural areas than urban areas [20] due to more stress factors in urban areas as compared to rural areas. Otherwise schizophrenia is twice as high in cities as in rural communities. A consistently found risk factor for development of Schizophrenia is living in an urban area [21]. Some reports have highlighted social disadvantage like poverty, migration, family dysfunction, unemployment, racial discrimination, and unemployment as a risk factor [22].

Regarding family type, the overall trend was of nuclear families than joint ones when two groups were studied (84% vs. 16%). When comparison was done in two groups, it was seen that Schizophrenia group had more nuclear families than group of Depression. These findings are consistent with those in literature that most mental illnesses occur in patients whose social life is dysfunctional or disturbed. The relation of family type (nuclear or joint) and illness type (schizophrenia or depression) may be seen as cause and effect relationship i.e. dysfunctional families may cause mental illnesses whereas mental illnesses can cause dysfunctional or disturbed families.

When the relationship of primary caregiver with patient was studied, it depicted that, mostly parents were primary caregivers in case of Schizophrenia (39% vs. 17%) and in case of Depression, caregivers were mostly spouses (60% vs. 34%). These findings show the general trend of caregiving in developing countries like India where parents are primary caregivers of unmarried children till, they get married and after marriage, spouse becomes the primary caregiver. These findings are consistent with the study of Stanley & Shwetha which also found parents as primary caregivers in majority in case of schizophrenia patients [23]. As majority of patients were unmarried in Schizophrenia group whilst majority were married in Depression group. The caregivers were parents in schizophrenia and spouses in depression. Spouses endure illness specific burdens along with burdens that occur secondary to their

family roles and partnership. From a biographical point of view, schizophrenia is often considered by spouses as a life changing occurrence which adversely affects the couple's relationship, the family and the spouse's own life. Quality of life and the spouse's satisfaction with the partnership is profoundly reduced due to chronic burdens of everyday living [24]. For categories like sons and daughters and others there was no statistically significant difference noticed.

During comparison of caregiver burden between two groups, it was found that the financial burden was more in Schizophrenia group than group of Depression. The differences in scores may be consistent with the fact that patients suffering from schizophrenia need continuous, regular and long-term treatment as compared to depression. Moreover, patients suffering from psychotic illnesses are brought more for treatment as that of neurotic ones. Our findings are inconsistent with the study done by [25] which concluded that financial burden was almost similar and was not statistically significant, when it was compared in spouses of patients suffering from Schizophrenia, Depression or Anxiety disorders. This finding may be due to country of study, which was done in Germany where most of patients could be insured medically. Our study included mostly poor patients from rural areas and all of them were uninsured, so we got the above results as expected. When the burden of debt was studied, Schizophrenia cohort show more burden score (statistically significant) than Depression in this category. Similar trend was seen when burden scores of effects on status of employment of caregivers was studied. There was significant difference in both groups and was much higher in Schizophrenia group. The loss of employment further adds to financial burden on caregivers. Both direct and indirect costs significantly increase the economic burden on caregivers. Travel to the mental health care facility was the largest expenditure, both in terms of time and money. This emphasizes on the need for distribution of facilities in the community, training the primary care physician to manage illness and fewer consultations during the stable phase of illness may reduce costs and reduce burden further [26]

The mean burden scores in category of effect on family routine and leisure activities was found to be more in Schizophrenia group than Depression group (7.65 vs. 3.47 & 5.32 vs. 2.04 respectively) and was statistically significant. The difference in two groups may be due to the amount of time spent by caregivers for caring their near and dear ones, which is more in case of schizophrenic illness. Our findings are similar to those of [27], who observed that burden in the sense of interference in their daily lives, was most marked for those caregivers who were in high contact with the patients.

Comparison of family burden in the category of effect on "social relations of family members" also depicted statistically significant difference in both cohorts under study. The Schizophrenia cohort show mean burden scores of 5.5 as compared to 2.04 in Depression category. These findings clearly show the impact of chronic psychotic illnesses over family's social interaction with society. The stigma attached to schizophrenia further adds to this problem. [28] observed the difference in social burden in caregivers by comparing positive & negative schizophrenia before and after treatment. They concluded that at the time of initial assessments, in the 'positive schizophrenia' group, no significant correlation between ratings on psychopathology and social burden was observed, although at the end of the period of follow-up significant reductions in ratings on psychopathology and social burden as well as significant correlation between severity of psychopathology and burden of care were noted. In the 'negative schizophrenia' group, the severity of psychopathology and social burden were significantly correlated, but at the end of six months no significant change either in severity of psychopathology or social burden emerged [28]. These findings can be a result of role of adjustment by caregivers in due course of illness.

When the effect of illness on physical and psychological health of caregivers was studied and compared in the two groups, it was seen that overall scores of burden were very less in category of physical health as compared to that of psychological health. When test of significance was applied, there was no significant difference between Schizophrenia and Depression group in the category of Physical health (mean scores were 0.16 vs. 0.31 respectively) but a statistically significant difference was seen in category of Psychological health and scores were higher in Schizophrenia cohort (1.78 vs. 1.21). [29] studied to determine patient's illness factors that have an impact on the stress experienced by the key relative across dimensions. On comparing the relatives of patients suffering from Schizophrenia and depression, the most important predictors of stress were relatives generalized negative stress response, life stressors, expressed emotions and neuroticism. A major cause for stress reduction was through interaction of relatives generalized positive stress and patient's residual symptoms. These findings supported the finding that in caring for a patient with severe mental illness, stress process has a transactional character. Finally, the subjective burden on family was assessed by asking standard question- 'how much would you say you have suffered owing to the patient's illness- severely, a little or not at all'? Scoring was done by relative's answer. We got the results that relatives of schizophrenia patients responded mostly severe burden as compared to Depression (mean scores= 1.73 vs. 0.98) and was statistically significant.

The overall scores of objective burdens were also more (statistically significant) when these two groups were compared. The total mean scores were 28.8 and 13.33 in Schizophrenia and Depression groups respectively. [30] investigated differences in participation in care of the patient along with family burden in patients diagnosed with affective disorders, psychoses, and other diagnoses. They also investigated the differences between different subgroup of relatives. Among the investigated burden items, difference between various subgroups was found only in 1 item. With this, they concluded that living with and being a close relative with a severely mentally ill patient in an acute situation, is an important factor for experiencing burden and participation in care. This contradicts the conventional knowledge that the burden differs based on diagnosis of the patient. This aspect has to be studied further. Similarly, [31] concluded after a study that coping and other elements of the caregiving experience in Bipolar Affective Disorders are no different from Schizophrenia.

[32] compared burden between caregivers of Depression and Bipolar affective disorders and found a significantly higher burden among families of patients with BPAD compared to those of major depression. Lower levels of functioning along with a chronic, prolonged course of illness correlated consistently with greater severity of burden. The findings of this study correlate with our study.

Ogilvie [33] in his study concluded that the objective burden in caregivers is significantly higher for those caring for BPAD than those caring for patients with unipolar depression. The pattern of burden is similar to findings of [34] in caregivers caring for patients with depression. Chakrabarti et al. [34] studied the pattern of burden in 90 families caring for various neurotic illnesses: 30 each with generalized anxiety disorder, dysthymia, and obsessive-compulsive disorder. In this study, burden was high in financial burden, disruption of family routine and leisure and interactions. The pattern was similar for all the 3 subgroups.

Our study tried to investigate various facts in comparing Schizophrenia (psychotic illness) & Depression (neurotic illness). There are very few studies which compared the caregiver burden in neurotic and psychotic illnesses. There is need for further research in this area.

Conclusion:

To summarize the socio-demographic data of our study, we found that male patients dominated the schizophrenia cohort (56% vs. 33%) as compared to the depression group where females' domination was seen (67% vs. 44%). Comparing the cohorts according to age, the distribution was similar in both groups, in different defined age groups. 34% of patients with diagnosis of Schizophrenia were unmarried as compared to 13% in case of Depression and there was no significant difference in case of divorcees or separated ones in the two groups. Evidently, the majority of the patients (75%) were from Hindu religion and rest were from Buddhist (20%) and Muslim religions (5%). In this sample size, 12.5% of total patients were illiterate, 28% were educated upto middle school, 31% were secondary school educated, 15% were educated upto senior secondary, 10.5% graduates and 3% were postgraduates but there was no statistically significant difference in the educational qualifications of these two groups of Schizophrenia and Depression. Comparing the socio-occupational functionality of the patients, many patients with Schizophrenia were unemployed as compared to patients with Depression (34% vs. 8%), which was statistically significant and most patients in depression group were doing household chores compared to Schizophrenia group (28% vs. 15%). Another significant finding was that the primary care givers in case of schizophrenia group were mostly parents (39% vs. 17%) and in case of depressive disorders caregivers were mostly spouses (60% vs. 34%). Patients in the sample were noticeably more from rural area (77.5%) compared to urban area (22.5%) as the study setting was in a rural hospital. It was also found that patients from schizophrenia group were living mostly in nuclear families as compared to depression group (93% vs. 75%) which was statistically significant.

Evaluating and comparing the burden of schizophrenia and depression in varying aspects through our research, we calculated the financial burden to be significantly higher in Schizophrenia group than Depression (Mean scores 8.34 ± 2.28 vs. 4.51 ± 1.95). Both the burden score of effect of illness on family routine and on leisure activities were significantly higher in Schizophrenia group than Depression (Mean scores 7.65 ± 2.23 vs. 3.47 ± 1.76 and mean scores 5.32 ± 1.99 vs. 2.04 ± 1.44 respectively). The effect on social relations of family members was also more statistically significant in Schizophrenia group than Depression (Mean scores 5.55 ± 2.5 vs. 2.04 ± 1.42). On the contrary, while the burden of effect on psychological health of family members was significantly higher in Schizophrenia group than Depression (Mean scores 1.78 ± 0.78 vs. 1.21 ± 0.79), the burden was found to be the same in both groups i.e. Schizophrenia and Depression regarding the effect on physical health of family members (Mean scores 0.16 ± 0.63 vs. 0.06 ± 0.31). Similarly, on assessing subjective burden on caregivers, it was found that there is a statistically higher significant burden in Schizophrenia group than Depression (Mean scores 1.73 ± 0.39 vs. 0.98 ± 0.42). Finally, the other burdens like debt due to patient's ($\chi^2 = 18.23$, P Value = <0.05), relatives' unemployment ($\chi^2 = 92.82$, P Value = <0.05), social isolation of family due to illness ($\chi^2 = 38.13$, P Value = <0.05) were also more in schizophrenia cohort than depression.

It was concluded that both objective (except effect on physical health of caregivers due to illness of patient) and subjective burden on the caregivers was significantly higher in group of Schizophrenia than Depression cohort in this study.

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