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A Study on Effects of Drug Addiction on Families in Telangana

Sridhar Reddy N[1], Koneru Kavya Sri[2], Pramod Kumar Reddy Mallepally[3]

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Abstract

Background & objectives: A member of the family who is addicted to substances has an impact on practically every element of family life. This results in issues, challenges, or unfortunate incidents that affect the lives of family members and put a tremendous burden on family caregivers. The purpose of the current study was to evaluate the pattern of stress experienced by the family caregivers of alcohol and drug dependent individuals. A member of the family who is addicted to substances has an impact on practically every element of family life. This results in issues, challenges, or unfortunate incidents that affect the lives of family members and put a tremendous burden on family caregivers. The purpose of the current study was to evaluate the pattern of stress experienced by the family caregivers of alcohol and drug dependent individuals.

Methods: ICD 10 diagnosed substance dependency patients and their family caregivers attending a de-addiction centre at a multispecialty teaching hospital in south India were the focus of a cross-sectional study. The pattern of hardship experienced by the family caregivers of 120 men with alcohol and/or opioid dependency was evaluated using the Family Burden Interview Schedule.

Results: In comparison to the opioid and alcohol+opioid dependence groups, the alcohol dependency group was more commonly older, married, working at the time, earning more money, and having the wife care for the child. Family strain was moderate or severe in 95 to 100% of instances for "disruption of family routine," "financial stress," "disruption of family contacts," and "disruption of family leisure" in all three groups. Family burden was associated with low income and rural areas. The size of the family, the type of caregiver, as well as the caregiver's education and occupation, were not associated to it, nor were the patients' age, education, or period of dependency.

Interpretation & conclusions: The majority of caregivers (95-100%) expressed a moderate or severe burden, highlighting the severity of the situation and the necessity for additional research in this area.

Keywords: Drug addiction; Family burden; Substance dependence.

Author's Affiliation: [1]Resident, [3]HOD, Department of Psychiatry, Mamata medical College, Khammam 507002, Andhra Pradesh, India, [2]Senior Resident, Department of Psychiatry, Mamata Academy of Medical Sciences, Hyderabad 500090, Telangana, India.

Correspondence Author: Koneru Kavya Sri, Senior Resident, Department of Psychiatry, Mamata Academy of Medical Sciences, Hyderabad 500090, Telangana, India.

Email: drkoneukavyasri@gmail.com

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INTRODUCTION

Background and Objectives

In India, the primary caregivers for patients, including those with mental illnesses, are their families. This has been ascribed to the interdependence of Indian culture, the concern of close family members in difficult times, as well as the lack of mental health professionals.[1] Those who look after other family members who require supervision or help due to illness or disability[2] or

those who supply unpaid care to family members with special needs[3] are considered family caregivers.

In terms of physical, emotional, and financial distress, as well as social and vocational dysfunction, an illness has a negative impact on both the person who is ill and those around them. This causes issues, challenges, or negative incidents that have an impact on the significant others' lives. This negative effect has been referred to as a burden[4] According to research[5], the family environment, namely how different family members cope with the patient's abnormal behavior, plays a significant role in determining the burden.

Although it is well acknowledged that substance misuse is a complex biopsychosocial phenomenon, substance dependency is viewed as a "family sickness."[6] S. A member of the family who is addicted to substances has an impact on practically every element of family life, including finances, social and interpersonal interactions, and leisure activities.

Substance abuse always causes more arguments, has a negative impact on family members, and costs the families. The psychological and behavioral effects on those around the substance-dependent family member are frequently far more severe. However, the study of family issues has received relatively little attention historically due to the focus on substance use as an individual issue. As a result, there is relatively little systematic study on the burden of substance abuse on family members.

The family and the family process have typically been studied almost exclusively as an etiological entity that affects the subject's substance use in research on families with substance dependent members.[7] The burden is more frequently associated with the disruptive behaviors of the substance dependent person as well as financial struggles brought on by lost income and/or money being diverted to support substance dependence.[8] Families with alcoholics are more likely to experience stressful life events, suffer from physical and psychological diseases, and need medical services more frequently.[9-13]

In a previous study[14] from India, families of 30 individuals with schizophrenia, opioid dependency, and alcohol dependence were compared. The Family Burden Interview Schedule (FBIS)[15] was used to determine the burden. Alcohol use, opioid dependency, and schizophrenia groups all showed moderately severe objective, subjective, and various domain burdens.[14] FBIS was employed in a different Indian study[16] to evaluate the burden faced by wives of males with opioid dependent syndrome. The patients were urban, between the ages of 31 and 40, and less than 12th-grade educated. On both the subjective and the objective assessment, severe burden was reported more frequently than moderate burden.[16] In 30 participants, 30 with intravenous drug use and 30 with alcohol dependency, a Nepalese study compared FBIS assessments of family hardship; the overall burden was higher with the former, and compared to other family caregivers, spouses were more tolerant and reported a lower perceived burden.[17]

The present study aims to examine the pattern of burden experienced by family caregivers of men seeking treatment for alcohol or/and opioid dependency in a de-addiction centre in south India. Alcohol and opioids are the most common substances for which treatment is sought in India.[18]

MATERIAL & METHODS

The Drug De-addiction and Treatment Centre, Department of Psychiatry, Mamata medical college, Telangana , south India, is a multispecialty teaching hospital serving in Telangana. The majority of patients are recommended by family members or themselves, while some come from other hospitals or divisions within our Institute. A group of clinical psychologists, nurses, social workers, and psychiatrists oversee the services. Outpatient, inpatient, basic laboratory, active and passive aftercare/follow-up, liaison with governmental and non-governmental organizations, and self-help groups are only a few of the services offered.

Comprehensive medical and psychosocial evaluations, including a look for physical and psychiatric co morbidities, are also part of the exams. Pharmacotherapy, psycho-behavioral therapies, and social-occupational rehabilitation are some of the treatment approaches used.

The institutional research ethics committee approved the study protocol. The data was gathered between March and May , 2022. It had a cross-sectional design. The outpatient service was used to draw the convenience sample. Both the patients and the caregivers involved in the study gave their written approval.

Family members who provided care for the patients who were seeking treatment for substance abuse made up the bulk of the sample. The family members of the patients were included in the study if they shared a home with the patients, were

directly involved in their care for their substance dependence and its treatment for more than a year, and were involved indirectly in general life care (sharing a kitchen, expenses, social obligations, and household chores including the care of children, the elderly, and the sick family members).

For the sake of comparability, the >1 year cut-off for caring was used because the vast majority of studies from India employed this cut-off.[19–22] The caregiver chosen for the study was the one who stayed together longer and participated in the patient's care more, as agreed upon by the patient, caregivers, and the treating clinician, in the event that more than one family caregiver was available. The caretakers were older than 18 years of age, of either gender, and were generally healthy.

The patients were males over the age of 18, with a diagnosis of alcohol, opioid, or alcohol+opioid dependency (40 in each group, for a total of 120 patients). The majority of them (100 subjects) were taking drugs to manage withdrawal (chlordiazepoxide/lorazepam for alcohol dependence, clonidine - NSAID - nitrazepam combinations for opiate dependence), while others (20 subjects) were taking drugs to reduce cravings or act as a deterrent (naltrexone for opiates and disulfiram, acamprosate, topiramate, or naltrexone for alcohol). If the patients or their carers had any severe physical sickness, organic brain condition, or mental impairment, they were disqualified from the study. From the patients, the caregivers, and the case notes if necessary, pertinent demographic and clinical information for the patients and the caregivers was gathered. The family burden interview schedule (FBIS)[15] was used to rate the selected family carers. Financial burden, disruption of family everyday activities, disruption of family leisure, disruption of family connection, impact on others' physical and mental health are the six topics covered by the FBIS, a semi-structured interview schedule. Each of its 24 items is scored on a 3-point scale (mild, moderate, severe). All items have an inter-rater reliability of 0.78 and a co relational validity of 0.72. There is also a question to gauge the overall subjective burden. The difference between the objective and subjective burdens is a reflection of the fact that many family members may be more or less tolerant and may downplay or exaggerate their issues. With the families of patients with mental retardation, chronic physical conditions, alcohol use, and schizophrenia, affective, and neurotic disorders, the measure has been utilized extensively in India.[19–22]

STATISTICAL ANALYSIS

SPSS version 14.0 for Windows (Chicago, Illinois, USA) was used to analyze the data. The frequency, percentage, mean, standard deviation, ANOVA, and post-hoc analysis with Bonferroni's correction were used to assess the descriptive data. Demographic and clinical factors were compared between the drug groups as well as the moderate vs. severe burden groups, with the continuous normally distributed variables using independent t test and the discrete variables by chi-square test. To identify the variables that are associated with either a severe objective or subjective family burden, binomial logistic regression analysis was utilized.

RESULTS

Patients Demographics: Compared to the opioid dependence and alcohol+opioid dependence groups, the alcohol dependence group was older (44.72 8.95 yr vs. 28.12 7.06 and 32.15 9.13 yr, respectively, P0.01), more often working (82.5 vs. 47.5 and 37.5, respectively, P0.01), with income of'>6000 per month (67.5 vs. 15 and 27.5 percent, respectively, P In terms of education, religion, family size, family type, and rural versus urban location, the three groups were comparable (Table I). Patients with alcohol dependence were shown to be substantially older than those with opioid dependence (44.72+/- 8.95 vs. 28.12+/- 7.06 yr, P<0.001) and alcohol+opioid dependence (44.72 +/-8.95 vs. 32.15+/- 9.13 yr, P<0.001) on post-hoc analysis with Bonferroni's correction.

Clinical Profile: The alcohol dependence group's duration of substance dependence was significantly longer than that of the opioid dependence and alcohol+opioid dependence groups (P <0.01). In 64.2% of patients, the duration of dependence was greater than five years (75 vs. 60 and 57.5%) in the alcohol dependence group compared to opioid dependence and alcohol+opioid dependence groups. Sixty-five percent of patients had co-occurring nicotine and drug addiction, with opioid dependence being more common than alcohol dependence and alcohol and opioid dependence (Table I). Patients with alcohol dependency exhibited higher durations of dependence than patients with opioid dependence (12.92 +/-9.18 vs. 5.82+/- 4.39 yr, P<0.001) and patients with alcohol+opioid dependence (12.92 +/-9.18 vs. 7.6+/- 7.34 yr, P=0.004), according to a posthoc analysis using Bonferroni's correction.

17% of patients had psychiatric co morbidity, which included psychosis (N=6), depression (N=5),

bipolar and anxiety disorders (N=4 each), and personality disorder (N=2). Alcohol dependence was more common than opioid dependence and alcohol+opioid dependence. 10.8% of patients had physical co morbidity, which was more common in the alcohol dependence group (17.5%) than in the opioid dependence and alcohol+opioid dependence groups (7.5%). These conditions included seizure disorder (N=9), gout, hepatitis, and alcoholic liver disease (N=2 each), as well as diabetes mellitus, pulmonary tuberculosis, and hypertension (1 each). 57.5 percent of people had a family history of substance abuse; this was more common in the alcohol dependence and alcohol+opioid dependence groups than in the opioid dependence group (P< 0.05). (Table I).

Table 1: Socio-demographic and clinical profile of patients

Variable	Total (N=120)	Alcohol (N=40)	Opioid (N=40)	Alcohol+ opioid (N=40)	P value
Age(years)	35+10.97	44.72+8.95	28.12+7.06	32.15+9.13	<0.01
Duration of dependence	8.78+7.79	12.92+9.18	5.82+4.39	7.6+7.34	<0.01
Marital Status					
Single	37(30.8)	1(2.5)	21(52.5)	15(37.5)	
Married	82(68.3)	38(95)	19(47.5)	25(62.5)	<0.01
Divorced	1(0.083)	1(2.5)	0	0	
Occupation					
Working	67(55.8)	33(82.5)	19(47.5)	15(37.5)	<0.01
Unemployed	53(44.2)	7(17.5)	21(52.5)	25(62.5)	
Education Status					
Illiterate	1(0.083)	0	1(2.5)	0	
1-5yrs	15(12.5)	7(17.5)	4(10)	4(10)	NS
6-10yrs	38(31.7)	12(30)	13(32.5)	13(32.5)	
>11yrs	66(55)	21(52.5)	22(55)	23(57.5)	
Monthly Income (Rs)					
Nil	54(45)	5(12.5)	22(55)	27(67.5)	
Upto 2500rs	6(5)	2(5)	4(10)	0	<0.001
2500-6000rs	16(13.3)	6(12.5)	8(20)	2(5)	
>6000rs	44(36.6)	27(67.5)	6(15)	11(27.5)	
Religion					
Hindu	58(48.3)	22(55)	22(55)	14(35)	
Muslim	58(48.3)	16(40)	17(42.5)	25(625)	NS
Others	4(3.3)	2(5)	1(2.5)	1(2.5)	
Family Type					
Nuclear	66(55)	23(57.7)	23(57.5)	20(50)	
Extended	39(32.5)	13(32.5)	12(30)	14(35)	NS
Joint	15(12.5)	4(10)	5(12.5)	6(15)	
Family Size					
<6 members	79(65.8)	25(62.5)	27(67.5)	27(67.5)	NS
>6 members	41(34.2)	15(37.5)	13(32.5)	13(32.5)	
Locality					
Urban	81(67.5)	28(70)	29(72.5)	24(60)	NS
Rural	39(32.5)	12(30)	11(27.5)	16(40)	
Nicotin dependence -present	78(65)	24(60)	29(72.5)	25(62.5)	NS
Psychiatric comorbidity -present	22(18.3)	10(25)	5(12.5)	7(17.5)	NS
Physical comorbidity -present	13(10.8)	7(17.5)	3(7.5)	3(7.5)	NS
Family history of substance dependence	69(57.7)	28(70)	16(40)	25(62.5)	<0.05

NS: Not significant, values in parentheses are percentages

The average age and level of education of caregivers were, respectively, 43.8+/- 12.4 and 10.42 +/-3.91 years. The proportion of caregivers who were wives was greater in the alcohol dependence group compared to the opioid dependence and alcohol+opioid dependence groups (P <0.01). In terms of age, education, and occupation, the family caregivers of the three substance dependent groups were comparable (Table II).

Table 2: Demographic profile of caregivers

Variable	Total (N=120)	Alcohol (N=40)	Opioid (N=40)	Alcohol + opioid (N=40)	P value
Age(yr)	43.85+12.4	41.17+10.65	47.3+13.15	43.07+12.74	NS
Education (yr)	10.42+3.91	10.77+4.44	10.27+3.35	10.22+3.95	NS
Relationship with patient					
Wife	59(49.1)	31(77.5)	11(27.5)	17(42.5)	<0.01
Father	29(24.1)	2(5)	15(37.5)	12(30)	
Mother	18(15)	1(2.5)	12(30)	5(12.5)	
Son	7(5.8)	4(10)	1(2.5)	2(5)	
Brother	7(5.8)	2(5)	1(2.5)	4(10)	
Occupation					
Working	46(38.3)	13(32.5)	15(37.5)	18(45)	NS
Unemployed	74(61.7)	27(67.5)	25(62.5)	22(55)	

NS: Not significant, values in parentheses are percentages

Burden: Across the three groups, the overall intensity of the caregivers' subjective and objective burden was largely similar, with most caregivers reporting either a moderate (52.5%) or severe (45.8%) level of burden, and very seldom none at all (1.7%). With the exception of the disruption of family leisure, which was reported as severe more frequently in the alcohol+opioid dependence group than in the alcohol dependence or opioid dependence groups (17.5 vs. 2.5% in the other groups) (P=0.01), the severity profile for the various areas of burden under consideration was similar across the three groups (Table III).

Table 3: Family Burden With Substance Dependence

Variable	Total(N=120)	Alcohol (N=40)	Opioid (N=40)	Alcohol+ opioid (N=40)	P value
Objective burden					
No	2(1.7)	2(5)	0	0	
Moderate	63(52.5)	22(55)	22(55)	19(47.5)	NS
Severe	55(45.8)	16(40)	18(45)	21(52.5)	
Subjective burden					
No	2(1.7)	2(5)	0	0	
Moderate	63(52.5)	24(60)	22(55)	19(47.5)	NS
Severe	55(45.8)	14(35)	18(45)	21(52.5)	
Areas of financial burden					
No	4(3.33)	4(10)	0	0	
Moderate	107(89.17)	34(85)	37(92.5)	36(90)	NS
Severe	9(7.5)	2(5)	3(7.5)	4(10)	
Disruption of family routine					
No	5(4.17)	4(10)	1(2.5)	0	
Moderate	65(54.17)	20(50)	22(55)	23(57.5)	NS
Severe	50(41.67)	16(40)	17(42.5)	17(42.5)	
Disruption of family leisure					
No	6(5)	5(12.5)	1(2.5)	0	
Moderate	105(87.5)	34(85)	38(95)	33(82.5)	NS
Severe	9(7.5)	1(2.5)	1(2.5)	7(17.5)	

Disruption of family interaction					
No	6(5)	5(12.5)	1(2.5)	0	
Moderate	96(80)	30(75)	33(82.5)	33(82.5)	NS
Severe	18(15)	5(12.5)	6(15)	7(17.5)	
Effect on physical health of family members					
No	83(69.17)	28(70)	32(80)	23(57.5)	
Moderate	37(30.83)	12(30)	8(20)	17(42.5)	NS
Severe	0	0	0	0	
Effect on mental health of family members					
No	39(32.5)	15(37.5)	9(22.5)	15(37.5)	
Moderate	80(66.6)	25(62.5)	30(75)	25(62.5)	NS
Severe	1(0.83)	0	1(2.5)	0	

NS: Not significant, values in parentheses are percentages

Except for the categories of "disruption of family leisure" and "impact on physical health of family members," where the alcohol+opioids dependence group had higher scores (P<0.05), the burden severity scores were equal across the three groups. For the length of drug dependency of< 5 vs. >5 yr and as reported by wives vs. other carers, the differences were not significant for both the objective and subjective burden.

When the demographic and clinical characteristics of patients (N=120) with severe vs. moderate subjective or objective burden were evaluated, more rural subjects than urban subjects (61.53 vs. 39.24%, P<0.05) reported experiencing severe subjective burden. When similar comparisons were made for different types of burden, it was found that unemployed subjects had significantly higher burden than employed subjects in the areas of financial burden (13.20 vs. 2.98, P<0.05), disruption of family routine (54.71 vs. 31.34 %, P<0.05), and disruption of family interaction (20.75 vs. 10.44%, P<0.05). In comparison to urban respondents, a higher percentage of rural subjects (42.59 vs. 24.62%, P=0.05) reported a moderate-to-severe burden on the influence on the physical health of family members.

The association between independent factors (demographic and clinical characteristics) that were more frequently present in people with severe burden was investigated using a simple binary logistic regression analysis with entry technique. With an odds ratio of 2.47 (CI=1.12-5.44, P<0.05) and the only significant predictor of severe subjective load being living in a rural area. Other factors like marital status, employment position, family structure, length of dependency, the existence of psychiatric or physical illness, and family history were not found to be significant predictors of severe subjective burden.

DISCUSSION

The functioning of the family and society are affected by substance abuse, and families of addicts bear a heavy weight of care. The profile of the linked components, which can both affect the problem's outcome and be helpful in devising and planning interventions to help the families manage with substance dependency, gives the study of family burden in substance dependence value.

In India, the joint family is the typical type of family. It is a household with multiple family subunits residing in various rooms throughout the same home.[24] Given that joint families are a more typical family structure, the family burden associated with substance dependence is crucial for India and other emerging nations. Additionally, it gains increasing relevance given the necessity of emphasizing the creation of community mental health services under the umbrella of primary healthcare and community involvement.[25] The objective is to address the requirements of both caregivers and patients, with a particular emphasis on patient care. The employment of a similar strategy has been successful in treating various mental conditions, including schizophrenia.[26]

Our sample's demographic and clinical characteristics were broadly consistent with those published in past research from other centre.[14,27] However, our opioid dependence group being more educated, more unemployed, and having fewer urban individuals in our study compared to a study from another centre in north India16 may be due to the other center's location in a large city. Our alcoholism group, however, resembled a Nepalese study 17 with more urban participants and more women serving as caregivers.

Given that all of our patients were staying with

their families, it was not surprising to find that the most common sources of stress were "disruption of family routine," "interactions," or "leisure." It is widely acknowledged that a psychiatric condition has the greatest effect on the family and frequently causes a full breakdown in the family's functioning.[8] Additionally, it seems sense that financial burdens are the most frequently cited burden, according to our research. Both substance misuse and psychiatric disease are expensive disorders to have globally. Particularly when it comes to substance abuse, a lot of money is spent on getting and using the drugs, dealing with the negative effects like accidents and crime, and seeking treatment by travelling to treatment facilities, paying for healers, including faith healers, and purchasing goods and services.[8]

In our study, participants with low income and those living in rural areas had higher objective and subjective burdens. Rural areas always have fewer employment and income opportunities. In terms of finances, disruption of routine and interaction within the family, as well as family members' mental health, the low income group was more burdened. Singles experienced greater disruption of family interaction, whereas subjects in opioid groups and extended families experienced significant disruption of family leisure. The subject's decision to remain single and his family caregiver's perception of a heavier load could both be related to more disruption of family interaction. Rural patients Staying in extended families with a higher risk of substance abuse or family history demonstrates the interaction between the family environment and its effects on the health of the family members.

In contrast to an earlier study from other centre that found married participants to be more burdened, particularly among the areas of finances, disruption of family routine, and consequences on mental and physical health[14], we discovered higher disruption of family leisure in singles. In contrast to the current study, the previous one found no evidence of a connection between increased burden and severe reliance. The rural population was also found to be more financially strained, and married, elderly, and female carers were found to report higher disturbance of family leisure time.[14]

Our study has a number of drawbacks. The results could not be extrapolated to other treatment facilities due to the small sample size and recruitment from a tertiary care facility. All of the patients were men, as was typical for our center. All data for the cross-sectional, non-blind burden assessments came from a single family caregiver. Numerous factors, including coping, appraisal, stated emotions, and social support, were not evaluated because the assessment of subjective burden was conducted globally. In order to better understand the precise impacts of substances and other mediators like family type, coping, and social support on the family load, future research should be undertaken in a large sample with prospective design.

In conclusion, our study shown that substance abuse was linked to significant burdens for the family members, more so for the alcohol+opioid dependency group than the opioid dependence group, and more so for both subjective and objective burdens in rural areas with low income. These results can offer recommendations for future directions for study in this field.

REFERENCES

1. Avasthi A. Preserve and strengthen family to promote mental health. Indian J Psychiatry. 2010;52:113–26.
2. Family caregiver. Medical Condition Dictionary. 2010-2011. [accessed on August 16, 2011]. Available from: http://medconditions.net/familycaregiver.html.
3. Caregiving in the U.S. (2009) [accessed on August 16, 2011]. Available from: http://www.caregiving.org/.../Caregiving _in_the_US_2009_full_report.pdf.
4. Platt S. Measuring the burden of psychiatric illness on the family: an evaluation of some rating scales. Psychol Med. 1985;15:383–94.
5. Steinglass P. The alcoholic family at home: Patterns of interaction in Dry, Wet, and Transitional Stages of Alcoholism. Arch Gen Psychiatry. 1981;38:578–84.
6. O'Farrell TJ, Fals-Stewart W. Treatment models and methods: Family models. In: McCrady BS, Epstein EE, editors. Addictions: A comprehensive guidebook. New York: Oxford University Press; 1999. pp. 287–305.
7. Rosemary A, Webester MH. Peer and parental influences on adolescent's substance use: a path analysis. Int J Addiction. 1994;29:647–57.
8. Bush M, Caronna FB, Spratt SE. Substance abuse and family dynamics. In: Friedman L, Fleming NF, Roberts DH, Hyman, editors. Source book of substance abuse and addiction. Baltimore: Williams and Wilkins; 1996. pp. 57–71.
9. Lennox RD, Scott-Lennox JA, Holder HD. Substance abuse and family illness: Evidence from health care utilization and cost-offset research. J Behav Health Serv Res. 1992;19:83–95.
10. Holder HD. The cost offsets of alcoholism treatment. In: Galanter M, editor. Recent

developments in alcoholism. New York: Plenum Press; 1998. pp. 361–74.

11. Connors GJ, Donovan DM, DiClemente CC. New York: Guilford Press; 2001. Substance abuse treatment and the stages of change: selecting and planning interventions.
12. Bhowmick P, Tripathi BM, Jhingan HP, Pandey RM. Social support, coping resources and codependence in spouses of individuals with alcohol and drug dependence. Indian J Psychiatry. 2001;43:219–24.
13. Ray GT, Mertens JR, Weisner C. The excess medical cost and health problems of family members diagnosed with alcohol or drug problems. Medical Care. 2007;45:116–22.
14. Chandra K. Chandigarh, India: Postgraduate Institute of Medical Education & Research; 2004. Burden and coping in caregivers of men with alcohol and opioid dependence, MD dissertation.
15. Pai S, Kapur KL. The burden on the family of a psychiatric patient: development of an assessment scale. Br J Psychiatry. 1981;138:332–5.
16. Shyangwa PM, Tripathi BM, Lal R. Family burden in opioid dependence syndrome in tertiary care centre. J Nepal Med Assoc. 2008;47:113–9.
17. Lamichhane N, Shyangwa PM, Shakya R. Family burden in substance dependence syndrome. [accessed on October 21, 2011]. Available from: http://www.thikthak.com/websites/gmc/journal.
18. Ray R. New Delhi: Ministery of Social Justice and Empowerment, Government of India and United Nations Office on Drugs and Crime, Regional office for South Asia; 2004. The extent, pattern and trends of drug abuse in India: National survey.
19. Chakraborti S, Kulhara P, Verma SK. Extent and determinants of burden among families of patients with affective disorders. Acta Psychiatr Scand. 1992;86:247–52.
20. Chakraborti S, Kulhara P, Verma SK. Family burden of neurosis: extent & determinants. Hong Kong J Psychiatry. 1996;6:23–8.
21. Gautam S, Nijhawan M. Burden on families of schizophrenia and chronic lung disease patients. Indian J Psychiatry. 1984;26:156–9.
22. Gupta M, Giridhar C, Kulhara P. Burden of care of neurotic patients: correlates and coping strategies in relatives. Indian J Soc Psychiatry. 1991;7:8–21.
23. Geneva: WHO; 1992. WHO. The ICD-10 classifcation of mental and behavioral disorders: Guidelines.
24. Bhushan V, Sachdev DR. The family. In: Bhushan V, Sachdev DR, editors. Introduction to sociology. 26th ed. Allahbad: Kitabmahal Publishers; 2006. pp. 291–322.
25. New Delhi, India: Ministry of Health and Family Welfare; 1982. National Mental Health Programme for India.
26. Scazufca M, Kuipers E. Stability of expressed emotion in relatives of those with schizophrenia and its relationship with burden of care and perception of patients' social functioning. Psychol Med. 1998;28:453–61.
27. Mattoo SK, Chakraborti S, Anjaiah M. Psychosocial factors associated with relapse in men with alcohol or opioid dependence. Indian J Med Res. 2009;130:702–8.