A Study of Prisoners in a Tertiary Psychiatric Institute

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Introduction

For many decades, it is well known that, there is a dynamic relationship between mental illness and crime. Psychiatric disorders are found to be prevalent in persons, who come in conflict with the law [1]. Psychiatric illness may be a contributory factor for the crime due to a lack of judgment, poor impulse control, and other psychiatric factors like delusions, hallucinations, and substance use [2, 4]. Anti social factors are more common in prisoners with high violence, impulsivity and substance use. Many previous studies have found a high prevalence of psychiatric morbidity in both genders [3, 4] even though majority of the inmates in prison are males. Previous studies have found that prisoners had a high history of drug abuse or dependence, before incarceration [5]. A prison environment itself can be stressful and can lead to psychiatric illness. Singleton et al [6] in his study found that persons who had been suffering from psychotic illness were locked up in the prison for a long time when compared to other inmates. Criminality is not innate [7] with prisoners but the interaction of biological processes with the environment, socio-cultural factors, substance use all play a role in criminal behavior. Understanding in this area is less due to the paucity of research. Few studies done were mostly from other countries [8-11].

In India Jha et al [12] studied the nature of criminal offenses of mental patients in 1968. Somasundaram et al [13] studied crimes of persons with schizophrenia in a hospital setting. Goyal et al [14] studied the psychiatric and socio-demographic aspects among 500 convicted prisoners from Amritsar central prison. Kumar et [15] studied the psychiatric morbidity of 118 prisoners in Rajasthan prison and found 58.8% prisoners had drug use history prior to imprisonment. Anitakumari et al[16] found a significant association between previous imprisonment, psychiatric diagnosis and the nature of crime. But there are hardly any studies available about the psychiatric morbidity among prisoners in a mental institution setting for the past few decades.

Comparing the psychiatric morbidity and crime based on gender in a psychiatric hospital setting has been hardly done in previous studies. Understanding the psychiatric morbidity in prisoners and treating them is a complex and challenging task. Hence efforts have been made to collect data and study prisoners who had come to the tertiary psychiatric care center for the past 16 years. In future it will form a base in understanding the nature of criminal behaviour of persons with mental illness and follow them up for proper treatment and rehabilitation.Analyzing the victim details and finding the most vulnerable group for

such crimes in the society might help us to create awareness and formulating strategies in preventing such violent crimes in future.

Aims

To evaluate the crime pattern and psychiatric morbidity and the relationship between the two among prisoners.

Materials and methods.

The study was done in our Institute which provides mental health care for the past 200 years. It is one of the largest tertiary care Institute in India catering to the mental health needs of our state and neighboring states. In our state this is the only hospital with separate prisoner wards for both males and females. A similar descriptive study of female prisoners[17] was done in our institute. The socio-demographic profile, crime pattern and psychiatric morbidity was assessed and the same was published. The plan of study was approved by the Institutional ethical committee. 280 patients are admitted on an average per month and seek inpatient services. Around 20-25 prisoners are referred to the institute per year.

The methodology used for the study was a retrospective chart review. The data was collected from the case records. Great efforts were put in for the retrieval of the data from the case records. The data of all the male and female prisoners referred to the Institute from 2001 to 2016 were analyzed. The sample from the previous study of female prisoners was also included.The socio-demographic data, clinical history, criminological history, and psychiatric diagnosis made as per ICD-10 were obtained. 385 patients had been referred to our Institute during this period. Of them, 31 were excluded from the study due to insufficient data for our study from the case records. Of the 31 patients, 25 were males and 6 were females. Finally 354 case records were analyzed and evaluated. The statistical analysis was done by SPSS version 20.

Results were expressed as percentages for qualitative variables and mean and standard deviation for quantitative variables. Association between two qualitative variables was done using chi-square. The value of $p < .05$ was taken as significant. Variables that were found to be significant on univariate analysis logistic regression were administered.

Results

Table: 1 Socio-demographic profile

AGE	N = 354	PERCENTAGE
< 20	14	4.0
20 – 30	120	33.9
30 – 40	118	33.3
40 – 50	77	21.8
50 – 60	19	5.4
> 60	6	1.7
GENDER	N = 354	Percentage
Male	301	85.0
Female	52	14.7
Transgender	1	0.3
AREA	N = 354	Percentage
Rural	250	70.6
Urban	104	29.4
EDUCATION	N = 354	PERCENTAGE
Illiterate	90	25.4
Primary	126	35.6
Middle	86	24.3
High	28	7.9
Graduate	24	6.8
OCCUPATION	N = 354	PERCENTAGE
Unskilled	89	25.1
Semiskilled	130	36.7
Skilled	57	16.1
Professional	38	10.7
Unemployed	40	11.3

SOCIO ECONOMIC STATUS	N = 354	Percentage
Upper	1	0.3
Upper middle	4	1.1
Middle / lower middle	27	7.6
Middle / upper lower	210	59.3
Lower	112	31.6
MARITAL STATUS	N = 354	Percentage
Married	217	61.3
Unmarried	137	38.7

The mean age in our study was 34.7. The majority belonged to the age group 20-30 (33.9%) and 30 -40 (33.3%). Of the 354 prisoners in our study 301(85%) were males, 52(14.6%) were females and one was transgender. 250 (70.6%) belonged to the rural setting. The majority of them had only primary school education(35.6%) and 25.4% were illiterate. Occupational data showed that most of them were semiskilled workers (36.7%) followed by unskilled workers(25%). On assessing the socioeconomic status based on the modified kuppusamy scale most of them (59%) belonged to the upper-lower group. 61.3% of prisoners were married.

Table 2: Crime details

TYPE OF PRISONER	N = 354	Percentage
Remand	214	60.5
Under trial	90	25.4
Convict	50	14.1
TYPE OF CRIME	N = 354	Percentage
Murder	143	40.4
Attempt to murder	18	5.1
Attempted suicide	3	0.8
Rape	10	2.8
Theft	51	14.4
Others	129	36.4
MURDER	N = 143	Percentage
Male	110	76.9
Female	33	23.1

On assessing the legal status (Table 2) of the prisoners, 60.5% were remand prisoners, 25.4% were under trial prisoners. Murder was the most common crime (40.4%). The other crimes included kidnapping, using dangerous weapons, using obscene words, trespass, criminal intimidation all accounting for 36.4%. On comparing the data of 143 murders, 76.9% of murders were committed by males.

Table 3: Details of the Victim

VICTIM	N = 143	Percentage
Family	88	61.5
Unknown	55	38.5
FAMILY MEMBERS AS VICTIM	N = 88	Percentage
Parents	35	39.8
Kids	15	17.0
Spouse	18	20.4
Others	20	22.7
FAMILY MEMBERS AS VICTIM	Male	Female
Parents	32 (91.4%)	3 (8.6%)
Kids	3 (20%)	12 (80%)
Spouse	11 (61.1%)	7 (38.9%)
Others	17 (85%)	3 (15%)

On the evaluation of the victim details of murder (Table 3), 88 (61.5%) were family members out of the 143 persons murdered. On assessing the victims among family members, parents (39.8%) were the most common victim, followed by spouses (20.4%) and kids (17.0%). On comparing the data between males and females, 80% of the kids were murdered by female prisoners, were as 91.4% of parents were murdered by male prisoners.

On assessing the psychiatric morbidity (Table 4) schizophrenia (40.1%) was the most common diagnosis followed by substance dependence (13.0%). Depression was found in 35 prisoners (9.9%). One transgender in our study had depression. Alcohol (21.4%) was the most common substance followed by polysubstance (16.7%) in our study.

Table 4: Psychiatric Morbidity among prisoners

Diagnosis	N = 354	%
Schizophrenia	142	40.1
Bipolar Mood Disorder(Mania)	37	10.5
Substance Dependence	46	13.0
Depression	35	9.9
Psychosis	33	9.3
Antisocial Personality	4	1.1
Mental Retardation	14	4.0
Others	43	12.1

Table 5: Substance dependence among prisoners

S.N.	Type of substance	N = 354	Percentage
1	Alcohol	76	21.4
2	Cannabis	8	2.3
3	Tobacco	39	11.0
4	Polysubstance	59	16.7
5	Others	7	2.0
6	Nil	165	46.6

While assessing the association between psychiatric diagnosis and gender, 90.1% of schizophrenia patients were male prisoners. 50% of depressive patients were female prisoners, showing that a high percentage of female prisoners were suffering from depression. On the chi-square test we found that the association between psychiatric diagnosis and gender was statistically highly significant. (p <.001)

Table 6: Association between psychiatric diagnosis, Crime, and gender

Diagnosis	Male	Female	p-value
Schizophrenia	128 (90.1%)	14 (9.9%)	<.001 df - 7
Bipolar mood disorder (Mania)	32 (86.5)	5 (13.5)	
Substance dependence	45 (97.8)	1 (2.2)	
Depression	17 (50%)	17 (50%)	
Psychosis	27 (81.8)	6 (18.2)	
Anti-social personality	4 (100%)	-	
Mental retardation	12 (85.7)	2 (14.3)	
Others	36 (83.7)	7 (16.3)	
Crime			
Homicide	110(76.9%)	33(23.1%)	<.001 df - 1
Non Homicidal	191(91%)	19(9.0%)	

The association between psychiatric diagnosis and previous history of psychiatric illness, history of crime, and the previous history of suicide was assessed. In the chi-square test we found that the association to be statistically significant. (p <.001). The association

between crime and gender was assessed (Table 6). 76.9% of homicide and 91% non-homicidal crimes were done by males. In Fisher exact test we found the association to be statistically significant. (p <.001)

On assessing the association between crime and diagnosis it was noted that 56.6% of murders were done by

schizophrenia patients, followed by 10.5% of murders done by depressed patients. 29% of non-homicidal crimes were done by schizophrenia patients and 19.5% non-homicidal crimes were committed by patients with substance dependence. In the chi-square test we found the association to be statistically significant. (p <.001)

Table 7: Association between crime and diagnosis

Crime	schizophrenia	bipolar	Substance	Depression	psychosis	ASPD	MR	others
homicide	81(56.6%)	9(6.3%)	5(3.5%)	15(10.5%)	14(9.8%)	2(1.4%)	6(4.2%)	11(7.7%)
Non homicidal	61(29.0%)	28(13.3%)	41(19.5%)	19(9.0%)	19(9.0%)	2(1.0%)	8(3.8%)	32(15.2%)
P value	<.001	Statistically significant			df – 7			

In logistic regression it was found that there was an association between homicide and male gender. In the socio-demographic there was an association with semi-skilled laborers. In psychiatric morbidity association between schizophrenia, bipolar disorder, substance abuse, and homicide was seen.

Discussion

The mean age in our study was 34.7 and the majority belonged to the age group between 20 – 40 years, which correlates with the study done by Kumar et al[15]. 85% of prisoners were males in our study which is a usual presentation like the study done by Goyal et al[14]. The young adults predominantly males are more prone to aggression and violence which has to be considered. 70.6% of prisoners were from the rural area in our study which is in concordance with the study done by Sethi et al[18] and Goyal et al[14]. The majority (35.6%) of the prisoners had only primary school education. Ayirolimeethal et al[16] also had a similar finding in their study.

On assessing the occupation 36.7% of prisoners were semiskilled workers. Kumar et al[15] in their study found

50.8% were unskilled workers. This difference could be due to the study in a different setting as this study was done in a hospital setting. 59.3% of prisoners belonged to the upper-lower socioeconomic status. Goyal et al[14] also had a similar finding in their study. Majority 61.3% were married in our study, which was concordant with Singh et al[19] and Ayirolimeethal et al[16] study.

60.5% of the prisoners were remand prisoners in our study. Murder was the most common crime (40.4%) in our study. Kumar et al[15] in their study found 47% of prisoners were murderers. O.Somasundaram et al[13] in his study of prisoners in a mental hospital setting found the majority of the crimes were murders. On comparing the male and female data we found that one-fifth of the murders (23.1%)were committed by female prisoners which reveals that violent crimes are also common among females which should be noted. Three female prisoners tried to attempt suicide after killing their kids.

On assessing the victim details we found that 61.5% of victims were family members. O Somasundaram et al[13] also had a similar finding in his study in 1977. On evaluating the family victims, it was found that parents

were the most commonly affected (39.8%). Comparing the data between males and females among family members, it was noted that the most common victim in male murderers were parents (91.4%) and female murderers were children (80%). Family context, sociocultural factors, and vulnerability could have played a role regarding the person being victimized. No previous study had assessed the victim details comparing the male and female prisoners.

In our study schizophrenia was the most common psychiatric morbidity which was similar to a previous study done by O Somasundaram et al[13]. Goyal et al[14] and Kumar et al[15] found that affective disorder was the most common psychiatric illness among prisoners which is not in concordance with our study as the former studies were done in a prison setting. In Nigeria Agbahowe et al[20] reported that (23%) prison inmates to be suffering from depression. Substance dependence was very common in our study which is in correlation with previous studies like Goyal et al[14] and Birmingham et al[21]. On comparing the psychiatric illness among male and female prisoners, depression (50%) was equally distributed among both, though the female prisoners were less in number. In our study there had been an association between psychiatric morbidity and crime which was statistically significant.

Limitations

1) This study was done from case records and not from patients directly which could lead to the skewing of data.

2) Since this is a tertiary psychiatric care hospital, only major psychiatric problems are referred /seen.

3) This study is a descriptive study and not a follow-up study which may be needed for detailed assessment and evaluation.

Conclusion

1) The study revealed that young adults (age group 20 – 40yrs) were involved in the crime and they had severe psychiatric morbidity. If awareness about early diagnosis and intervention is made there could be a possibility of a reduction in the crime rate.

2) The murder was the most common crime. The victims being family members reveals that aggression is mainly shown towards the intimate ones. In the case of females the vulnerable victims were their children.

3) Female murderers who tried to attempt suicide after killing their children felt that they didn't want their kids to suffer after their death.

4) The understanding of committing violent crimes between the males and females should be viewed from a different perspective in terms of diagnosis and treatment as females suffered from depression and males from schizophrenia.

5) Substance use disorders are found more common in males which could be a precipitating factor for the crime.

6) Future research and followup is needed for the better understanding in this area for early intervention strategies to be started.

References

1. Coid J. How many psychiatric patients in prison? Br J Psychiatry 1984;145:78-86.

2. Maden T, Swinton M, Gunn J. Psychiatric disorder in women serving a prison sentence. Br J Psychiatry 1994;164:4454

3. Jordan BK, Schlenger WE, Fairbank JA, Caddell JM. Prevalence of psychiatric disorders among incarcerated women. II. Convicted felons entering prison. Arch Gen Psychiatry 1996;53:5139

4. Fazel S, Bains P, Doll H. Substance abuse and dependence in prisoners:A systematic review. Addiction 2006;101:181-91.\

5. Anderson HS, Sestoft D, Lillebaek T, Gabrielsen G, Hemmingsen R,Kramp P. A longitudinal study of prisoners on remand: Acta Psychiatr Scand 2000;102:19-25.

6. Pattanaik, J. K., & Mishra, N. N. (2001).Social change and female criminality in India. Social Change, 31(3), 103-110

7. Law & Psychiatry in India: An Overview Raveesh BN*, Anil KMN and Narendra KMS Journal of Forensic Science & Criminology Volume 1 | Issue 2

8. Appelbaum PS, Clark Robbins P, Monahan J. Violence and Delusions: Data from
   the MacArthur Violence Risk Assessment Study. American Journal of Psychiatry,2000; 157: 566-572

9. Lindqvist P. Violence against a Person: The Role of Mental Disorder and Abuse. Ameå University Medical Dissertations, Sweden, 1989

10. Herrman H, McGorry P, et al. Hidden severe psychiatric morbidity in sentenced prisoners: An Australian study." American Journal of Psychiatry, 1991, 148(2): 236-239.

11. Hafner H. & Böker W. Crimes of Violence by Mentally Abnormal Offenders (trans.H. Marshall). Cambridge: Cambridge University Press, 1982

12. Jha BK. A study of the nature of criminal offences of mental patients.Indian J Psychiatry 1968;10:116.

13. Somsundram O. Crimes of persons with affective disorders. Indian J Psychiatry 1977;19:60-2.

14. Goyal, et al.: Psychiatric morbidity in prisoners Indian Journal of Psychiatry 53(3), Jul-Sep 2011

15. Kumar and Daria: Psychiatric morbidity in prisoners, Indian Journal of Psychiatry 55(4), Oct-Dec 2013

16. Ayirolimeethal, et al.: Psychiatric morbidity among prisoners Indian Journal of Psychiatry 56(2), Apr-Jun 2014

17. Dr V.Sabitha et al JMSCR Volume 05 Issue 06 June 2017

18. Sethi BB, Gupta SC, Sinha PK, Gupta OP. Pattern of crime, alcoholism and parental deprivation. Indian J Psychiat 1971;13:275-81

19. Singh G, Verma HC. Murder in Punjab: A psychosocial study. Indian J Psychiatry 1976;18:243-51.

20. Agbahowe SA, Ohaeri JU, Ogunlesi AO, Osahon R. Prevalence of psychiatric morbidity among convicted inmates in a Nigerian prison community. East Afr Med J 1998;75:19-26.

21. Birmingham L, Mason D, Grubin D. Prevalence of mental disorder in remand prisoners: Consecutive case study. BMJ 1996;313:1521-4.

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