

Death behind the Bars: Prison Mortality in India

Background: Imprisonment is now the most serious penalty that can be employed by the courts. The prison represents the power of the state to the ultimate. There are around 10.1 million prisoners worldwide and increasing over the last decade. They are mostly pre trial/remand prisoners. Almost half of these are in US, Russia and China. The US has the highest prison population rate in the world (Walmsley, 2011). India ranks fifth among countries having largest number of prisoners preceded by USA, China, Russia and Brazil. Prison population in India is on a rise. As per National Crime Record Bureau (NCRB) incarceration rate has increased from 30 in the year 2001 to 32 prisoners per 100,000 population in 2012.

Overcrowding has become a serious problem for the correctional administration in India. There are about 1276 prisons with accommodation capacity of 2.8 lakh, however the total number of inmates is around 4 lakh (Kumar *et al.*, 2013). Overcrowding has serious impacts on prisoners' health. The deleterious effect of overcrowding on prisoners' health is evident from the fact that the skin and other infectious diseases tend to grow (Human Rights Watch, 1991). Prisoners have poor sanitary conditions; the ratio of latrines to prisoners is very low. If in the cell then they are required to answer the call of nature in pots kept in the cell, making the atmosphere stinky and extremely unhygienic. Thus prisoners bear a substantial burden of infections, physical and mental disorders as compared to general population (Fazel & Baillargeon, 2011). All of this take a toll on inmates' health and can be a strong reason of prisoners' morbidity and mortality.

A study in Andhra Pradesh, India revealed the tragic story of denial of treatment to its prisoners leading to a rise in deaths of inmates under custody (Karnam, 2009). The same study cited lack of quick medical attention as one of the most important reason for prison deaths. A prisoner is referred to the hospital only on being too critical and the process is so long that the prisoner dies before even reaching the hospital. And the irony is that the government knows about this fact about prison deaths are increasing due to a lack of timely police escort.

Thus the prison standards and the attitude of prison authorities are not favorable for the survival of prisoners in Indian context. All of this take a toll on inmates' health and can be a strong reason of prisoners' morbidity and mortality.

Criminal demography is less explored by the researchers in India. Since most of the previous studies regarding prison mortality have been done in other countries (Fazel & Benning, 2006; Kariminia *et al.*, 2007; Kariminia, Butler, Jones, & Law, 2012; Liebling, 1996; Patterson, 2010; Smith, 1984) and we lack this kind of studies in Indian context thus we aim to explore this issue of prison mortality in India. The study of prison mortality is of particular importance in the current era of large prison population growth in India.

This study aims to bring out the number of deaths occurring in prisons. It will examine the trend of deaths in prisons from 2001 to 2012. Further it will explore the type of deaths happening in prisons, and calculate the rate of prisoners' mortality by type of deaths i.e. natural, unnatural, suicides, homicides etc. The state wise trend of deaths is also studied to find the states where deaths are highest.

Data & Methodology:

The data in this paper has been developed from the National Crime Records Bureau (NCRB) portal. The annual publications of the Bureau viz. 'Crime in India', 'Accidental Deaths and Suicides in India' and 'Prison Statistics India' are providing relevant and useful data and detailed statistical information on crime, Accidental deaths & suicides and Prisons in the country. These publications are in great demand within the country and abroad. With a view to benefit the stakeholders, NCRB has digitized all the editions of these reports ('Crime in India' from 1953 onwards, 'Accidental Deaths and Suicides in India' from 1967 onwards and 'Prison Statistics India' 1995 from onwards) and made available on NCRB

website. These reports can be downloaded by the stakeholders for the purpose of reference and their use. We have used the raw data on inmate deaths in prison. The file provides information on the type of deaths happening in prison by sex. The file was downloaded in MS excel format and further cleaned and processed for the analysis of the paper. There was no information available on age at death of prisoners.

Prisoners Mortality Rate is computed as number of prisoners' death per 100,000 jail inmates during a year. Prisoners Suicide rate is computed as number of suicides by prisoners per 100,000 jail inmates per year. Homicide Rate among prisoners is computed as murder of inmates per 100,000 jail inmates by fellow jail inmates. Following the similar pattern natural and unnatural death rates of prisoners was also calculated. Differentials in prison mortality by sex are also explored. Further adult mortality rate of general population is computed using census survival method and interpolated for each year (2001-2012) and compared with the prison mortality.

Objectives:

1. To explore the total number of deaths (natural and un-natural) of prison inmates in India and states.
2. To examine the suicide and homicide rate of prisoners in India from 2001 to 2012.
3. To compute and study the trend of prisoners mortality rate in India from 2001 to 2012 and compare it with adult mortality of general (non-prison) population.

Results: Total inmate deaths in 2001 were 986 and reached up to 1471 in 2012. Male prisoners contribute the largest chunk of total deaths. Deaths are rising every year, for both male and female. Around 90 percent of total deaths are natural. There were 93 unnatural deaths in 2001, maximum number of unnatural deaths i.e. 130 held in 2004, after that it decreased but again rose to 118 in 2012. Totals deaths increased by 49 percent from 2001 to 2012. Among the larger states in Uttar Pradesh the percent change of prisoner's deaths is 267 percent, highest in India followed by Punjab, 191 percent.

Prisoners Mortality Rate: The average mortality rate among prisoners in the period 2001 to 2012 is 361 deaths per one lakh prisoners. This is 36 deaths out of 10000 prisoners and around 4 prisoners die out of 1000 prisoners.

State Wise Prisoners' Deaths: Prison mortality is highest in Uttar Pradesh. All throughout last decade UP remained the top state in terms of deaths followed by Maharashtra, Bihar and Andhra Pradesh.

Suicide and Homicide in the Prison: Suicide in the prison has increased over the years. In fact suicide rate doubled within a decade. Over the last four years from 2009 to 2012 suicide rate in the prison has gone high. There are a few cases of homicide reported in the prison. Homicide is murder by inmates in the prison.

Prison mortality by Sex: In 2001, male prison mortality was 307 per 1 lakh male prisoners and female prison mortality was 7.3 per 1 lakh female prisoners which rose to 367 and 14.3 in 2012 respectively. Male to female ratio of deaths was 50 in 2001 which reduced to 26 in 2012 indicating the rise in female deaths. Now for every 26 male inmate deaths there is 1 female inmate death.

Limitations & Conclusion:

Due to unavailability of unit level data we were unable to calculate the mortality trend by age. NCRB does not provide information on causes of death and age at death, thus the main factors contributing to the natural deaths in prison remains unexplored. However future studies are suggested on primary level to include the cause of death with social covariates, since we strongly believe that imprisonment and its repercussions should not become the cause of someone death. The reliability of NCRB data is also questionable because they are based on police reports (Patel et al., 2012) but being the only source of death data in prison we have to rely on NCRB data.

Suicides are the leading cause of unnatural deaths in India and have almost doubled in the last decade. The study revealed the rate of suicide in prison is almost double than the general population suicide. The factors behind this need a detailed in-depth study.

We do not advocate being soft on the prisoners but we insist on human and sensitive treatment to this section of society. They are imprisoned, it's their punishment, but being there and dying is not part of punishment. Prisons should also come under the welfare policies of the government and deaths should be minimal. Proper health care, sanitation facilities and timely reference to the hospitals may lead to the reduction of deaths in the prisons. Everyone has right to life, so does a prisoner.

Figure 1: Total inmates deaths of prisoners during 2001-2012, India, NCRB



Table 1: Total prison inmates by age distribution, India (2001-2012), National Crime Records Bureau

Prison Inmates by Age	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
16-18 years	1.83	1.20	0.66	0.32	0.38	0.18	0.13	0.05	0.02	0.07	0.03	0.03
18-30 years	44.56	45.67	43.29	42.58	43.13	41.49	43.23	41.61	43.29	43.37	44.02	42.24
30-50 years	43.61	42.56	44.96	45.81	44.57	45.95	45.40	46.10	44.11	43.91	43.23	44.00
50+ years	9.99	10.58	11.09	11.29	11.92	12.38	11.24	12.25	12.58	12.64	12.73	13.73
Total	313635	322357	326519	331391	358368	373271	376396	384753	376969	368998	372926	385135

Table 2: Prison Mortality Rate, India (2001-2012), National Crime Records Bureau

Year	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
Prison Inmates	313635	322357	326519	331391	358368	373271	376396	384753	376969	368998	372926	385135
Deaths	986	1033	1047	1184	1356	1437	1336	1525	1443	1429	1326	1471
PMR	314.4	320.5	320.7	357.3	378.4	385	354.9	396.4	382.8	387.3	355.6	381.9

Computed using NCRB data on Inmates Deaths

PMR: Prison Mortality Rate

Table 3: Prison Suicide Rate, India (2001-2012), National Crime Records Bureau

Year	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
Prison Population	313635	322357	326519	331391	358368	373271	376396	384753	376969	368998	372926	385135
Suicide by inmates	36	47	44	50	42	59	59	49	76	68	68	87
Suicide Rate	11.5	14.6	13.5	15.1	11.7	15.8	15.7	12.7	20.2	18.4	18.2	22.6

Computed using NCRB data on Inmate Deaths

Table 4: Prison Natural and Unnatural Death Rate, India (2001-2012), National Crime Records Bureau

Year	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
PNDR	284.7	294.1	294.3	318.1	359.1	364.6	331	377.9	354.7	362.3	331.2	349.2
PUNDR	29.7	26.4	26.3	39.2	19.3	20.4	23.9	18.5	28.1	24.9	24.4	32.7

Computed using NCRB data on Inmate Deaths

PNDR: Prison Natural Death Rate, PUNDR: Prison un-natural Death Rate

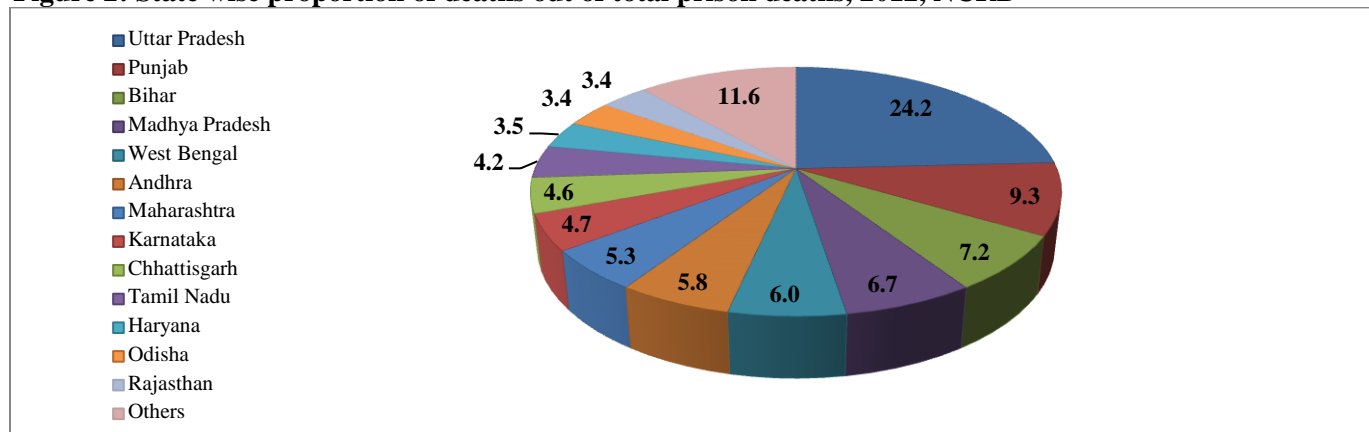
Table 5: Differentials in Prison Suicide rate and General Population Suicide Rate, India (2001-2012), National Crime Records Bureau

Year	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
Prison Suicide rate	11.5	14.6	13.5	15.1	11.7	15.8	15.7	12.7	20.2	18.4	18.2	22.6
General Population Suicide rate	-	10.5	10.4	10.5	10.3	10.5	10.8	10.8	10.9	11.4	11.2	11.2

Computed using NCRB data on Inmate Deaths

General population suicide rate available from the report “Accidental deaths and Suicides in India”, NCRB.

Figure 2: State wise proportion of deaths out of total prison deaths, 2012, NCRB



References:

- Fazel, S., & Baillargeon, J. (2011). The health of prisoners. *Lancet*, 377(9769), 956–65. doi:10.1016/S0140-6736(10)61053-7
- Fazel, S., & Benning, R. (2006). Natural deaths in male prisoners: a 20-year mortality study. *European Journal of Public Health*, 16(4), 441–4. doi:10.1093/eurpub/cki223
- Human Rights Watch. (1991). *Prison Conditions in India*.
- Kariminia, A., Butler, T., Jones, J., & Law, M. (2012). Increased mortality among Indigenous persons during and after release from prison in New South Wales. *Australian and New Zealand Journal of Public Health*, 36(3), 274–80. doi:10.1111/j.1753-6405.2012.00844.x
- Kariminia, A., Law, M. G., Butler, T. G., Corben, S. P., Levy, M. H., Kaldor, J. M., & Grant, L. (2007). Factors associated with mortality in a cohort of Australian prisoners. *European Journal of Epidemiology*, 22(7), 417–28. doi:10.1007/s10654-007-9134-1
- Karnam, M. (2009). Deaths in Prisons in Andhra Pradesh. *Economic and Political Weekly*, 44(11), 19–23.
- Kumar, S. D., Kumar, S. a, Pattankar, J. V, Reddy, S. B., & Dhar, M. (2013). Health status of the prisoners in a central jail of South India. *Indian Journal of Psychological Medicine*, 35(4), 373–7. doi:10.4103/0253-7176.122230
- Liebling, (1996). Deaths in Custody: International Perspectives. *Canadian Journal of Criminology. Revue Canadienne de Criminologie.*, 38(3).
- Patel, V., Ramasundarahettige, C., Vijayakumar, L., Thakur, J. S., Gajalakshmi, V., Gururaj, G., ... Jha, P. (2012). Suicide mortality in India: a nationally representative survey. *Lancet*, 379(9834), 2343–51. doi:10.1016/S0140-6736(12)60606-0
- Patterson, E. J. (2010). Incarcerating death: mortality in U.S. state correctional facilities, 1985-1998. *Demography*, 47(3), 587–607. Retrieved from <http://www.pubmedcentral.nih.gov/articlerender.fcgi?artid=3000056&tool=pmcentrez&rendertype=abstract>
- Smith, R. (1984). Deaths In Prison. *British Medical Journal (Clinical Research Ed.)*, 288(6412), 208–212.
- Walmsley, R. (2011). *World Prison Population Report(ninth edition)* (pp. 1–6). London.
- Prison Statistics India, National Crime Records Bureau. Available from: <http://ncrb.nic.in/PSI2007/prison2007.htm> [Last accessed on August 2014]
- National Crime Records Bureau. *Accidental Deaths and Suicides in India*, Available at <http://ncrb.gov.in/CD-ADSI-2012/ADSI2012.pdf> accessed on August 2014.