

THE INTERNATIONAL JOURNAL OF HUMANITIES & SOCIAL STUDIES

Climate Change and Its Impact on Farmer Suicides

Dr. A. N. Gayathri

Assistant Professor, Department of Sociology, FMKMC College, Madikeri, Karnataka, India

Abstract:

Like most modernizing countries, India has seen a decline in the number of individuals who engage in agriculture for a living. In the decade between 2001 and 2011, for example, the government estimates the number of Indian farmers declined by 9 million people, which marks the first absolute decline in this segment of the population since 1971. As a percentage of the populace, farmers declined by 7 percent during the last decade, and they now constitute less than a quarter of India's population. These numbers, in and of themselves, don't necessarily constitute a bad trend.

Yet one harrowing sign of the state of Indian farmers is the suicide rate. For decades Indian farmers have been committing suicide at alarming rates that are well above the rates of the population at large, which itself has been rising. Moreover, the problem does not appear to be getting any better; in fact, it is if anything worsening, despite the state's efforts to address the problem.

Poverty and debt are likely a large part of the problem. Interestingly, another likely culprit in the suicide phenomena is almost certainly climate change. Three of the "Big 5" are located along India's coast, and like many Indian farmers, rely heavily on the monsoon each year for their crops. If a drought occurs they are left without a harvest that year, despite having spent enormous amounts of money on inputs like fertilizer and seeds.

The Specific Objectives of the Present Research Paper are

- *To examine the incidence of suicides of famers in these three districts of Karnataka- Chitradurga, Davanagere and Tumkur.*
- *To draw socio- economic profile of the farmers who are committed suicide in the three districts of Karnataka and to identify the causes there in.*
- *To know the impact of climatic change on farmers suicides*

Method of Study

This paper is based on a study on 227 Farmers who committed suicides during the years 2001-2007 in Chithradurga, Davanagere and Tumkur district of Karnataka.

1. Introduction

Establishing a link between climate change and mental health, the World Health Organisation has said extreme weather conditions like floods, droughts and natural calamities can lead to psychiatric illnesses. "Psychosocial illnesses are a part of the various health issues associated with climate change," Poonam Khetrapal Singh, Deputy Regional Director, WHO, said.

Anticipating that severe flooding may become more frequent due to global warming, a WHO report said that independent studies in cyclone-affected Orissa and a flooded town in England has shown that post-traumatic stress disorder syndromes of different severity in affected people even after an year. Another area is the mental health impact of drought, a likely sequence of climate change. Drought-affected farmers can undergo severe mental agony due to financial hardship from increased debt, it said.

It is difficult for farmers to plan for crops, stocking, improvements, breeding and succession. This affects other businesses, limiting their ability to expand and employ staff. Drought affects family relationships also leading to stress, worry and an increase in the rate of suicides. It can also lead to isolation and increased workload as fewer workers take on more work, partners move off the farm for additional income or for school needs and families can no longer afford social support.

"The phenomenon of farmers' suicides in India is a typical example of consequences of climatic vagaries in poor, predominantly agrarian economies," the report said. The report goes on to say that in general population, the 12-month prevalence rate of mild and moderate common mental disorders is on an average of about 10 percent in countries across the world.

Loss of government subsidies, international competition and recently erratic climate patterns are all being blamed for a staggering number of Indian farmers who resorting to suicide, Al-Jazeera is reporting. More than 17,368 Indian farmers reportedly killed themselves in 2009, the worst figure for farm suicides in six years and an increase of 1,172 from the previous year's figure, data from the National Crime Records Bureau indicate. Nearly all of the bereaved families of those who have committed suicide reportedly had problems with debt and land loss due to failing crops.

"Poverty has assaulted rural India," journalist Palagummi Sainath, an expert on rural poverty in India, told The Independent, before noting that most of the suicides are taking place in the region known as the nation's cotton belt. The price of cotton in real terms, he

says, is roughly a twelfth of what it was 30 years ago. "Farmers who used to be able to send their children to college now can't send them to school."

Like most modernizing countries, India has seen a decline in the number of individuals who engage in agriculture for a living. In the decade between 2001 and 2011, for example, the government estimates the number of Indian farmers declined by 9 million people, which marks the first absolute decline in this segment of the population since 1971. As a percentage of the populace, farmers declined by 7 percent during the last decade, and they now constitute less than a quarter of India's population. These numbers, in and of themselves, don't necessarily constitute a bad trend. After all, a decline in the agrarian population could be a sign of increased productivity, or simply greater opportunities in the urban population.

Yet one harrowing sign of the state of Indian farmers is the suicide rate. For decades Indian farmers have been committing suicide at alarming rates that are well above the rates of the population at large, which itself has been rising. Moreover, the problem does not appear to be getting any better; in fact, it is if anything worsening, despite the state's efforts to address the problem.

One of the more authoritative studies on the subject, "Farmers; suicides in India: Magnitudes, Trends and Spatial Patterns", examined farmer suicides in India between the years of 1997 and 2006. According to the latest census, which was taken for 2011, nationwide, farmers committed suicide at a rate of 16.3 per 100,000 farmers. This was slightly higher than the 15.7 per 100,000 farmers who had committed suicide per 100,000 in 2001. Overall, official statistics show that since 2001, one Indian farmer has committed suicide every half hour. But the real shock comes when one compares the numbers to the Indian population at large, which has also experienced a rising suicide rate in recent years. For example, among the population writ large, an average of 11.1 Indians per 100,000 killed themselves in 2011. Thus, India's farmers committed suicide at a rate 47 percent higher than the rest of the population. The problem has become so bad that some states stopped keeping track of the suicide rate among farmers.

One of the interesting trends in India's agricultural suicide rate is how concentrated it is among certain states in the country. Specifically, five states Maharashtra, Andhra Pradesh, Karnataka, Madhya Pradesh and Chhattisgarh account for a large (and growing) number of the suicides among farmers in the country. Thus while the suicide rate was 16.3 among farmers nationwide in 2011, and 11.1 among the non-farming population, it was an astonishing 29.1 persons per 100,000 farmers in Maharashtra. Overall, The Hindu notes, the "Big 5" accounted for just over half of the number of farmer suicides in 1995, but by 2011 the "Big 5" made-up over two-thirds of the suicides among farmers in India.

Poverty and debt are likely a large part of the problem. As journalist Palagummi Sainath, who has long covered the issue, notes, four of these five states are in the cotton belt region of India, and the price of cotton in real terms is a twelfth of what it was thirty years ago. Furthermore, the government removed subsidies for cotton in 1997, around the time the suicide rate among farmers began becoming apparent.

Interestingly, another likely culprit in the suicide phenomena is almost certainly climate change. Three of the "Big 5" are located along India's coast, and like many Indian farmers, rely heavily on the monsoon each year for their crops. If a drought occurs they are left without a harvest that year, despite having spent enormous amounts of money on inputs like fertilizer and seeds.

There's anecdotal evidence to back this up. For example, *The Huffington Post* notes, "More than 17,368 Indian farmers reportedly killed themselves in 2009, the worst figure for farm suicides in six years and an increase of 1,172 from the previous year's figure." Notably, there was also a huge drought in 2009.

The dawn of the last decade of the twentieth century unfolded changes that swept the societies across the globe with far reaching consequences. The incidence of farmers' suicides in India is an indicator of the state of agriculture swayed by the vicissitudes of globalization and its ramifications in various sectors of society in unforeseen trajectories.

It was reported that during the years, 1997-2007 that 1,82,936 farmers have committed suicide in India. Of these, two thirds suicides have occurred in Maharashtra, Karnataka, Andhra Pradesh, Madhya Pradesh and Chattisgarh. Karnataka in particular has reported 3000 suicides during 1998-2006. India being predominantly an agricultural nation, this pathological phenomenon of farmers' suicide is a social malady, which needs to be researched empirically in depth for evolving effective interventions.

The present study is carried out in the three districts of Bangalore division of Karnataka State-Chitradurga, Davanagere and Tumkur districts. The incidence of farmers' suicides in these three districts during the research period is presented here below.

2. Findings and Discussions

Sl. No.	Year	Davanagere	Chitradurga	Tumkur
1	Before 2001	1	1	2
2	2001	6	13	5
3	2002	4	10	6
4	2003	22	23	41
5	2004	15	19	5
6	2005	6	11	6
7	2006	15	18	22
8	2007	11	16	13
	Total	80	111	100

Table 1: Farmers' suicides in three selected Districts of Karnataka

The incidence of Farmers' suicides in the three districts of Bangalore division of Karnataka is during the period 2001-2007 is presented in Table no.1 which reveals that Farmers' suicides were very high in Chitradurga district compared to the other two districts. Moderate suicide rates were registered in Tumkur district. And lesser farmers' suicide rates at in Davanagere district.

The general impression about Karnataka state is that it is a well irrigated state but the incidence of suicides in this state in all regions drives home the point that the far reaching changes precipitated by globalization and its ramifications have far reaching repercussions for the farming community who are in predominant numbers in rural India. It is in the geographic, demographic and ecologic setting that the present study is carried out.

The profile of the farmers who had committed suicides in Chitradurga, Davanagere and Tumkur districts of, Bangalore division of Karnataka state are discussed below. A glance of the socio-economic profile would enable us to have deeper insight into the problem of farmers' suicide.

The first variable discussed in socio economic characteristics, is the age of the farmers who had committed suicide.

Sl.	Year	No. of farmers	Percent
1	Before 2001	5	2.20
2	2001	14	6.12
3	2002	12	5.28
4	2003	59	25.97
5	2004	45	19.83
6	2005	23	10.14
7	2006	38	16.75
8	2007	31	13.65
	Total	227	100.00

Table 2: Distribution of Farmers by the Year of their suicide

The data presented in table 2 reveals that year wise suicide of farmers. The present study on farmer covered suicides in Davanagere; Tumkur and Chithradurga districts beginning from the year 2001. Numbers of suicides registered before the year 2000 were very less. After 2001, continuous failure of crops and bore wells had disastrous effects on the social and economic life of the farmers pushing them to the point of frustration. The year 2003 was the year of severe drought. Famine created havoc to the farmers. The underground water level got depleted. That being the case highest number of suicides got registered during 2003. Due to the intervention of government, farmer suicides slightly declined by 10.17 percent in 2004 and it declined sharply by 48.89 percent by 2005 due to the hue and cry raised by the media. Immediately the government swung into action by bringing about various sops in the form of crop insurance and compensation. But the suicides rose by 65 percent by 2006. It was mainly due to untimely monsoons, severe power cuts and drought conditions. But during 2007 the ground nut crop was satisfactory. The overall yield of ground nut rose and the incidence of suicides declined to 13.65 percent.

From the above discussion, it can be rightly inferred that erratic monsoon rains on the one hand and successive drought conditions on the other caused failure of crops. In addition to this the bore wells dried up. Besides this the hope of farmers to redeem themselves by borrowing didn't pay off. Spurious seeds, pesticides and fertilizers have also added misery to the farmers. All these factors pushed the farmers into debt trap from which they could never come out and being helpless they ended their lives by committing suicide.

Sl. No.	Month	Distribution of Farmers	Percent
1	January	23	10.15
2	February	16	7.05
3	March	17	7.48
4	April	15	6.60
5	May	13	5.74
6	June	11	4.85
7	July	16	7.05
8	August	27	11.89
9	September	37	16.29
10	October	17	7.48
11	November	18	7.94
12	December	17	7.48
	Total	227	100.00

Table 3: Month wise distribution of farmers' suicides during 2001-07

A look at the above table which depicts the month wise suicides of the farmers reveals that the suicides occurred all through the year. But when we look closer at the table it can be seen that more suicides occurred during September (16.29%), August (11.89%) and

January (10.15%). The point of inference here is that August is the month by which it would be known clearly whether monsoon rains are going to be normal, in some places it might rain, at that time if there are no rains by that time the farmers become frustrated. Farmers' normally simple, hard working busy people. When they become idle without work and when it does not rain in time to start agricultural operations they become terribly dejected. Their agony gets multiplied when the failure of monsoon occurs in successive years dashing their hopes of repayment of loans. The incidence of more suicides in January (10.15%) is due to the deprivation caused by the loss of crops or low yield. Normally January is a month when farmers celebrate 'Sankranti', a thanksgiving festival of farmers, after the crop comes home. When all others celebrate, farmers experience sense of relative deprivation and tend to commit suicide in frustration and despair.

The farmers are deeply immersed in indebtedness. For the past 8 to 9 years they have fallen prey to the vagaries of nature in the form spells of drought and failure or untimely rains. Every year their dreams of reaping bumper got dashed against the rocks. November is the month of harvest. Before November the farmers not only estimate the produce but also the profit and loss that they are likely to incur. If there are no rains by that time, hopes of getting a bumper crop they feel disgusted, dejected and end their lives. Hence the incidence of suicides is very high in the months of January, August and September.

Sl.	Age	No. of farmers	Percent
1	< 30	15	6.61
2	31 – 40	58	25.55
3	41 – 50	77	33.93
4	51 – 60	51	22.46
5	60 >	26	11.45
	Total	227	100.00

Table 4: Age wise distribution of Farmers who had committed suicides

The details about the age of the farmers, who had committed suicide presented in the table above reveals that 25.55 percent of the farmers were in the age group of 31-40 years, whereas; 33.93 percent farmers were in 41-50 age group. On the whole in a sample of 227 farmers, 66 percent farmers committed suicide in the most productive part of their lives. The average age of the farmers who had committed suicide is 47.6 years. The younger generation of farmers who wanted to make prosperous career in agriculture got buckled down caught up in debt trap. The cost of inputs, spurious fertilizers, poor quality seeds have added to their misery. The frequent drought spells during 2001-07 had driven the farmers to desperation. Their hopes of recovery through a bumper crop got dashed against led to their fateful suicides.

Being young made them more status conscious and when the status loss had been terrible to bear, the farmers found recourse in pesticide to take away their lives. Apart from all these, they started comparing themselves with the people in urban region who they thought were leading comfortable lives. In their resultant reference group behaviour and anticipatory socialization process, they are caught up with conspicuous consumption with rising high expectations consistently over a period of last 5 to 6 years.

In the face of repeated crop failures, these contributory factors propelled them to a point of dejection and frustration ending up in their lives at relatively young and most productive time of their lives.

Sl.	Land owned	No. of farmers	Percent
1	0 – 5 Acres	173	76.22
2	6 – 10 Acres	41	18.06
3	11 – 15 Acres	8	3.52
4	16 – 20 Acres	2	0.88
5	21 – 25 Acres	1	0.44
6	31 > Acres	2	0.88
	Total	227	100.00

Table 5: Distribution of the farmers by extent of land owned

Table number 5 depicts the distribution of the farmers by the extent of land owned. From the table it is evident that about 76.22 percent of the farmers owned less than 5 acres of land. Nearly 18.06 percent possessed 6 to 10 acres of land. 3.52 percent of them had 11 to 15 acres of land. Only 0.88 percent of the victims were large scale farmers.

The inference that could be drawn is that small size of the landholdings is the real bane behind farmers sacrificing their precious lives. As majority of the land holdings being small, farming itself has become uneconomical. On the one hand scientific farming is not feasible and viable and on the other the small size of the land holdings came in the way of getting sufficient institutional credits and crop insurance.

Secondly, most of these small scale farmers moved from pillar to post to procure loans from the government in vain. They had no other options except to rely on the private money lenders. Owing to the exorbitant rates of interest levied by the money lenders the

poor farmers were never in a position to repay the debts. The cost of cultivation soared; the farmers' became desperate to get a good crop to repay debts which was thwarted by failure of monsoon rains. With every increase in the interest and penal interest the hopes of repaying them got crushed. In this manner farming is delinked from the earth, the soil, the biodiversity, the climate, the generosity of the earth etc., and is replaced by the greed of money lenders and thus the small farmers led into a debt trap. Simply saying the sheer inability of the poor farmers was thus the chief reason behind the pathetic end of their lives. Hence the suicide rate is high only among those who possessed small pieces of land, who could neither manage the cost of cultivation nor stick to traditional agricultural practices.

Sl. NO	Income	No. of farmers	Percent
1	<Rs.20,000	37	16.30
2	20,000 to 25,000	62	27.31
3	25,000 to 50,000	84	37.00
4	50,000 to 75,000	19	8.37
5	75,000 to 1 lakh	14	6.17
6	>1 lakh	11	4.85
	Total	227	100.00

Table 6: Distribution of farmers by Income

The income levels of farmers are presented in the table No.6 which reveals the distribution of farmers by their income levels. As indicated in the table, 37 percent of the farmers' income is between Rs.25, 000 to Rs.50, 000. About 27.31 percent of the farmers' income ranges between Rs.20, 000 to 25,000. There were about 16.30 percent of them having less than Rs.20, 000 income. Around 8.37 percent of the farmers' income was between 50,000 to 75,000. A small 6.17 percent of them earn between 75,000 to 1 lakh. Only 4.87 percent of the farmers' income was more than 1 lakh.

Majority of the farmers were small farmers, their income level was very low corresponding to it, is the standard of living. Earlier, the cost of living used to be manageable except for medical and other emergency requirements. After globalization the cost of cultivation soared and they were unable to meet even daily expenses and were burdened by their family expenses like marriages of their daughters etc. On the other hand some farmers who had more than 5 acres regularly invested for the production of the crop but due to the drought situations they too faced loss every year. Their returns were very less when compared to their investment.

The situation is same even with the other farmers who had more than 10 acres. They invested more on to the various types of input. As they had large land holdings they tried to go in for scientific farming, which was more systematic and costly. They hoped to get good returns from each crop but in the process fell into the debt trap, to a point of no return.

Sl. No.	Annual Expenditure	No. of farmers	Percent
1	< Rs.20,000	21	9.25
2	20,000 to 30, 000	58	25.55
3	30,000 to 50,000	102	44.93
4	50,000 to 80,000	19	8.37
5	80,000 to 1 lakh	13	5.73
6	1lakh >	14	6.17
	Total	227	100.00

Table 7: Distribution of farmers by their expenditure

The above table no.7 throws light on distribution of farmers according to their annual expenditure. As indicated was the table 44.93 percent of the farmers' expenditure in between Rs. 30,000 to Rs.50, 000. Around 25.55 percent of them fall in the category in between Rs. 20,000 to Rs. 30,000. Only 9.25 percent of the farmers' expenditure is less than Rs. 20,000. Around 8.37 farmers' expenditure is in between Rs. 50,000 to Rs. 80,000. Above 6.17 percent of the farmers expenditure is more than Rs. 1 lakh. Remaining 5.73 percent of them expenditure is between Rs. 80,000 to Rs.1lakh.

After a shift from traditional cultivation to modern cultivation, the farmers preferred only hybrid seeds, chemical fertilizers and pesticides. As a result investment on the agriculture inputs increased high. Majority of the farmers who had land between 5 to 8 acres require an amount of Rs. 30,000 to Rs. 50,000 as investment. Similarly, 4 to 5 acres of land requires an investment of Rs. 20,000 to Rs. 30,000; farmers below 3 acres invest below Rs.20, 000. Farmers' with 9 to 12 acres of land invested between Rs.80, 000 to Rs. 1 lakh. Only limited numbers of farmers, who had more than 12 acres, invested more than Rs.1 lakh. The investment mentioned above also includes the farmers' family expenses.

Majority of the farmers' preferred to use advanced input devices that incur high investment which finally results in high yield provided the availability of water at the right time. Due to dry lands, irregular monsoons, the returns were not proportionate to the

investment. Despite the continuous failures, the farmers have been investing regularly with a fond hope of good returns to clear away debts.

Sl.	Crops grown	No. of farmers	Percent
1	Sunflower	6	2.64
2	Ground Nut	202	88.99
3	Others	19	8.37
	Total	227	100.00

Table 8: Distribution of farmers based on the Crops grown

An analysis of the distribution of the farmers based on the crops grown is given in Table 8. About 88.99 percent of farmers cultivated groundnut; 2.64 percent sunflower and the remaining 8.37 percent grew different crops like onion, rice, wheat and cotton. In Davangere district farmers basically grow sugarcane, coconut, ground nut etc. In Chitradurga district farmers grow onion, cotton, ground nut, maize etc. In Tumkur district farmers grow sunflower, groundnut and rice etc.

Most of the farmers being illiterates, they were unaware of the merits of rotation of crops. As such from times immemorial they were accustomed to grow ground nut only. This had almost transformed their lands into barren pieces. Naturally the production had come down considerably due to mono cropping. This alone is the prominent factor that upholds the phenomenon of spurt in the rate of farmers' suicide. Accordingly the helpless and frustrated farmers commit suicide.

Secondly, indiscriminate methods of cultivation coupled with total negligence of scientific farming methods have rendered farming ineffective. On the other hand the agricultural investment was increasing day by day as such the need for cash has increased substantially with fast changing life styles and conspicuous consumption which forced them to borrow and keep pace with others. Dearth of economic resources along with the usual social pressure, have made many small and marginal farmers to borrow for farming and family expenditure and ultimately end up in suicide. This process got intensified during the last decade under the sway of liberalization and globalization.

Sl.	Source of irrigation	No. of farmers	Percent
1	Dry	173	76.22
2	Canal	15	6.61
3	Tank	17	7.48
4	Bore well	22	9.69
	Total	227	100.00

Table 9: Distribution of farmers by their Sources of Irrigation

Distribution of farmers by source of irrigation is presented in Table 9 reveals that almost 76.22 percent of the farmers depend on dry land farming. As such most often they look at the blue sky to shower blessings on them. But the uncertainty of the rains over the years had rendered the poor farmers clueless. Ground nut is the major crop of these regions. But year after year the overall yield of ground nut has been steeply declining.

Nearly 9.69 percent relied on bore wells for cultivation. About 7.48 percent of the farmers under took tank water for farming. Only 6.61 percent of the farmers have irrigational facilities and are utilizing canal water to cultivate the lands.

The most significant feature in the agricultural arena of Karnataka state is that the percentage of cultivable land has been deplorably reducing due to lack of sufficient water in the traditional tanks and canals. Increase in the bore well irrigation is one more reason that has contributed to worsen the situation in Karnataka. It is observed that only the farmers in Davanagere district are making good of the canal water from Tungabhadra.

Sl. No.	Problems	No. of farmers	Percent
1	Economical	189	83.26
2	Psychological	21	9.25
3	Sociological	17	7.49
	Total	227	100.00

Table 10: Distribution of the victims by their problems

In Table 10 an attempt is made to analyze the problems that haunted the farmers. Most often their problems revolved around economic issues. Added to these, were the psychological and sociological problems.

The statistics in the above table indicate that about 83.26 percent of the farmers were deeply engulfed by financial problems. This was due to the continuous failure of the crops, diminishing returns in agrarian sector, conventional and unscientific means of agriculture and above all, the stubborn unyielding lands. About 7.49 percent of the suicides were accounted to psychological problems. Members

belonging to the dominant castes never wanted to get humiliated at the hands of money lenders. False prestige and the desire to maintain dignity at any cost, forced them to end their lives pathetically. Finally, the economic problems on the one hand and the discussions about the suicides often and often on the other hand disturbed the psyche and mental balance of the farmers. This resulted in enhancing the stress and tension of the victims. Inability to control the stress and tensions in life drove them to forcible death.

The inference that could be arrived at is that, farmer suicides are not caused by only one factor or a single problem. It's related to a number of problems. Of these problems, the economic problems account for a lion share in the number of suicides. This was also observed by S. Vijay Kumar and K.S.Bhat (2006). The psychological and sociological problems also, to a small extent, contribute to farmer suicides.

Sl.	Worries	No. of farmers	Percent
1	Water for crop	57	25.11
2	Failure of Crops	58	25.55
3	Indebtedness	109	48.02
4	Diseases of crops	3	1.32
	Total	227	100.00

Table 11: Distribution of farmers on the factors that were worrying them

Distribution of the farmers on the factors that worried them, is depicted in Table 12. It is evident that nearly 48.02 percent of the farmers were victims of indebtedness. Failure of crops was the cause of worry for 25.55 percent of the farmers. About 25.11 percent were worried about providing water for the standing crops. Only 1.32 percent worried about the stubborn diseases of the crops and the crop loss due to pests.

It is evident that a few decades ago agriculturists aimed at local market economy. Importance was given to subsistence only. But after the green revolution, the local market oriented subsistence economy has transformed into input intensive agriculture economy, which is global market oriented. This has precipitated the use of hybrid seeds. It's a known fact that the hybrid crops demand huge capital investment. It, thus, has driven the farmers to seek loans. With banks slamming the doors on farmers by cutting down subsidies as part of structural adjustments, farmers went into the hands of the private money lenders, who readily gave loans at exorbitant interests.

Secondly, recurrent drought conditions over the past eight years had made the farmers gasp for breath. Due to this, the ground water level also got depleted. Along with it, the position of farmers got deteriorated. The natural calamities, in this way, sealed the fortune of the farmers.

Finally, mono crop pattern is followed in all the three selected districts. Hanging on to the same crop from times immemorial had made sprinkling of pesticides useless. Persistent crop diseases have, thus, become the order of the day in these districts. This too, has badly let down the poor farmers to worry about.

An inference that could be drawn is that, the farmer was caught in the vicious cycle of poverty. The farmers' entire life revolves around agriculture alone. The cruelty of nature coupled with increasing agriculture expenses and diminishing returns had pushed him into the debt trap. Actually, after the harvest, the farmers were supposed to repay the debts. Due to unfavourable climatic conditions and untimely rains didn't yield good crops, the farmers, instead of, repaying debts had to seek. The admixture of failure of crops, depleting ground water resources led to indebtedness. Piled up debts sealed the fate of farmers at a point of no return.

3. Suggestions

The study on the basis of findings pertaining to the suicides of farmers and the conditions of the widows of the farmers offers the following suggestions for evolving:

- Organization of Farmer' Guilds to bring all farmers into a fold to educate them about the farming, management of resources particularly water resources and marketing strategies. This guild is to be the nodal agency between the farmers and the government.
- The state should encourage co-operative farming strengthening flow of credit through co-operative farming and the co-operative credit system collapsed in most of the districts in the state should be revived.
- Making DWAMA to advice farmers on water management and the judicious use of water and advice at times of identifying points for bore well.
- The agricultural Extension to be made to offer farm and family stressing on distress management.
- Ensure food security by linking vulnerable groups to other employment schemes.

4. Conclusion

The failure of monsoon rains, depleting water resources have dashed their hopes in successive years thus landing them into a debt trap. The sense of insurmountable economic debts and the concomitant loss of social status and esteem it resulted, drove them to a point of desperation resulting in there, alienation and depression prior to their suicides.

The study sought to examine the incidence of farmers' suicide in the three districts of Karnataka state. The failure of monsoon rains, depleting water resources had dashed their hopes in successive years landing them in debt trap. The economic debts had wiped away their social status. Pushing the small farmers into desperation alienation prior to their suicides.

5. References

- i. Bhalla G.S. & Tyagi G.s,(1989)- Patterns in Indian Agricultural Development- A District Level Study, New Delhi (Institute for studies in Industrial development)
- ii. Bhat,K.S & Vijayakumar,S (2004) 'Undeserved Deaths', New Delhi, Allied Publishers.
- iii. Choudhary K.R et. Al (1998) – Distress of Farmers X-Rayed: A Case of Andhra Pradesh.
- iv. Dublin, Louis I(1963) 'Suicide- A Sociological and Statistical Study, New York, Ronald.
- v. Freud,Sigmund (1917, Mourn and Melancholia, Vol 4, pp152-170 .
- vi. Freud,Sigmund,(1959) Collected Papers, International Psycho-Analytic Library No 10, London, Hogarth, New York, Basic Books.]
- vii. Hanumantha Rao, V and Others, Andhra Pradesh at 50: A Data Based Analysis, Data News Features Publications, Hyderabad, 1998.
- viii. Jayathi Ghosh: "Despair in Anantapur", Deccan Chronical. Oct. 2, 2004.
- ix. Mohanty, B.B. 2001, Suicides of Farmers in Maharashtra: A Socio-Economic Analysis Review of development on Change , 6 (2): 146-89.
- x. Muzaffar Assadi (1998) – Farmers' Suicide – Signs of Distress in Rural Economy, Economic and Political Weekly, April
- xi. Parthasarathy, G. and Shameem 1998, Suicides of Cotton Farmers in Andhra Pradesh: An Exploratory Study, Economic and Political Weekly, 33 (13): 720-26.
- xii. K.Radhakrishna Murthy,et.al (2005)'Agrarian Distress and farmers suicides in Andhra Pradesh, An Interdisciplinary study Centre for Social Research (2005) Andhra University , Vishakhapatnam.
- xiii. Vasavi, A.R., 1999, Agrarian Distress in Bidar: Market, State and Suicides, Economic and Political Weekly, 34 (32): 2263-68
- xiv. Vidya Sagar R. :New Agrarianism and the Challenges for Debt" in Satya Murthy, T.V.(ed) Class Formation and Political Transformation in Post-colonial India, Oxford University Press, New Delhi, 1996.
- xv. Vidya Sagar,R & Suman Chandra K(2004) Farmers' Suicides in Andhra NIRD.