

Substance Abuse

Percentage distribution of consumption of alcohol and tobacco	
Alcohol	13.7
Gutka	16.7
Bidi	14.2
Cigarette	5.7
Smokeless tobacco	5.4

Abuse of substances, namely, alcohol, tobacco and other substances was assessed in the study as these are major risk factors for many NCDs. More than one out of every 10 respondents (13.7%) reported consuming alcohol. Of the 197 respondents who reported consuming alcohol, 14.2% had consumed alcohol in the 24 hours prior to the interview. More than half (52.3%) of these reported consuming alcohol for more than once in a week and 33.5% reported consuming for more than four times in a month.

Close to one-third (31.7%) of the respondents reported consuming tobacco. Of these 15.7% consumed smokeless tobacco and 16% smoked tobacco.

Percentage distribution major impacts of consumption of alcohol	
Loss of peace at home	23.9
Violence at home	14.7
Debt	6.1
Selling of assets to meet day-to-day needs	4.1
Police case	4.1
Innsufficient fund to fulfil family daily needs	5.0
Loss of job	2.5

In addition to self-reported use of substances, social and economic problems associated with substance abuse were also assessed. The most reported impacts of alcohol or tobacco consumption were in two areas, namely, loss of peace at home and violence at home.

Key Insights for Program Design

Overall, the study provided the following insights for designing a community based NCD prevention and treatment program in rural areas.

- Interventions for preventing any NCD in rural areas need to focus on enhancing the knowledge of risk factors along with the nature of disease.
- An integral component of NCD prevention programs needs to be mitigation of mental stress, social and economic difficulties, as these appear to be considered among the most important reasons for NCD.
- Overall, the use of health services for screening and/or treatment of any NCD appears to be much lower than needed. This could be because of both poor health-seeking behaviour as well as poor availability and accessibility of health services. Therefore, NCD prevention program needs to focus on improving demand for health services, linking to existing health services and enhancing availability of health services.
- NCD prevention programs need to have a specific focus on enhancing women's knowledge of risk factors along with creating space and opportunities for women to seek health services.

Drawing from these insights Ambuja Cement Foundation took the first step of initiating a NCD prevention and treatment program for hypertension and diabetes at four locations where the study was conducted. The program focuses on creating awareness and knowledge about the diseases in communities, developing community based support systems and facilitates screening and treatment by linking the communities to government's health programs and facilities.

¹ WHO (n.d.) World Health Organization – Non-communicable Diseases (NCD) Country Profiles – 2014. Available at <http://www.who.int/nmh/countries/en/>. Accessed on June 21, 2015.

² Patel, V., Chatterji, S., Chisholm, D., Ebrahim, S., Gopalkrishna, G. et. al. (2011). Chronic diseases and injuries in India. *Lancet*, 377, 413-428.

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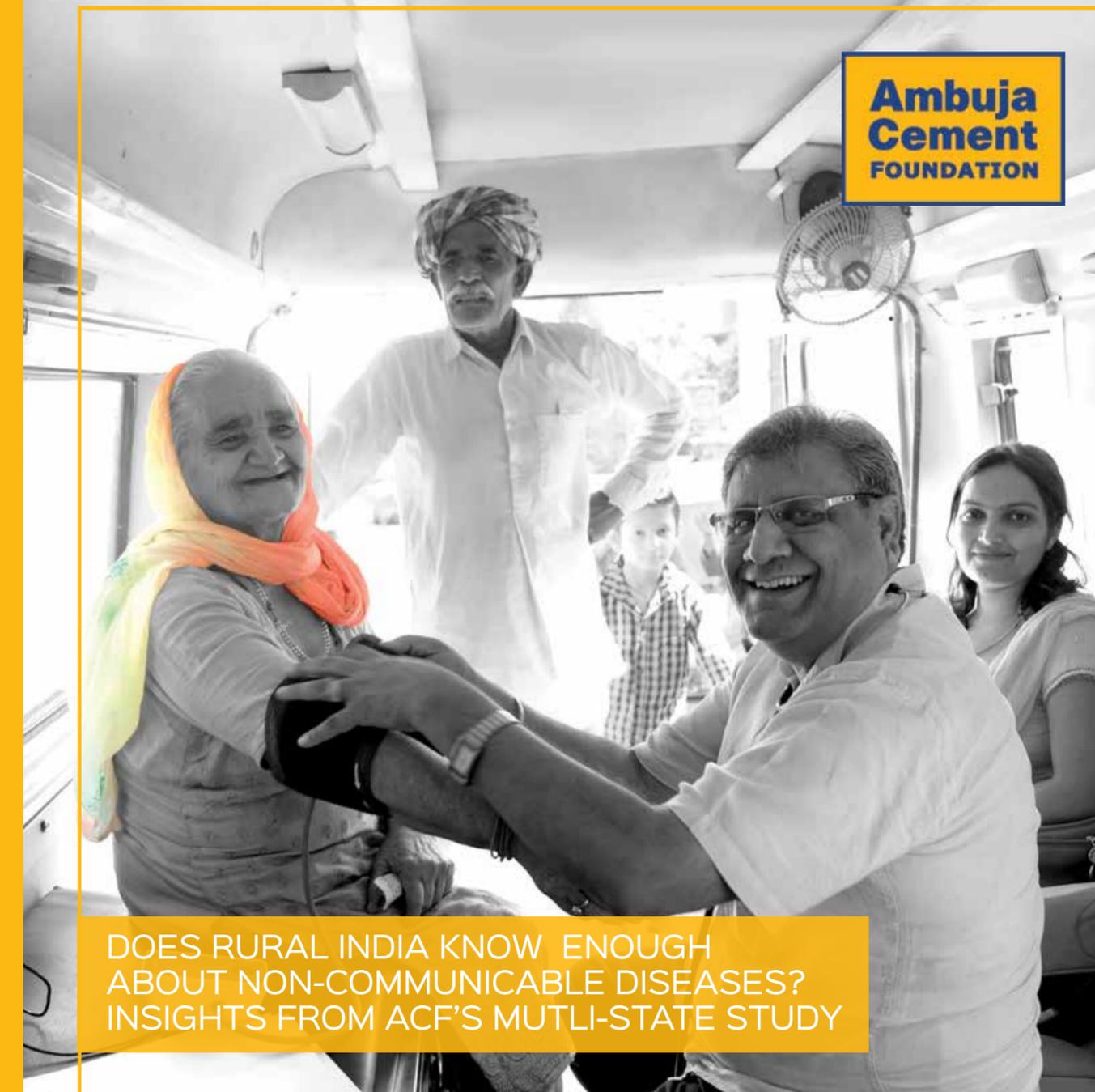
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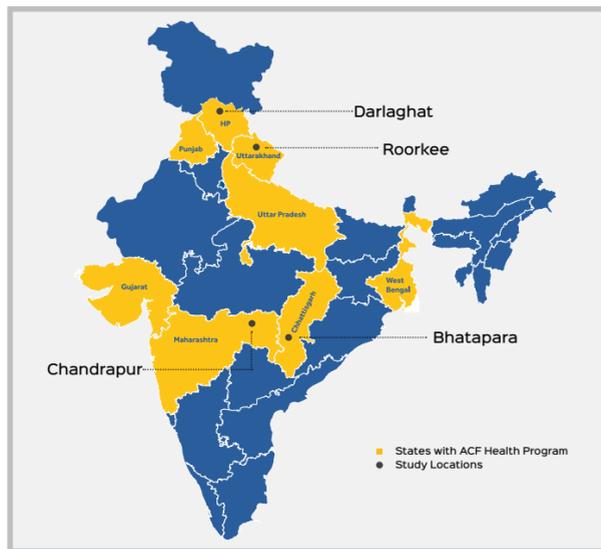
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DOES RURAL INDIA KNOW ENOUGH ABOUT NON-COMMUNICABLE DISEASES? INSIGHTS FROM ACF'S MUTLI-STATE STUDY

Today, non-communicable diseases (NCD) such as cardiovascular disease (CVD), diabetes, cancer and mental illnesses are rapidly rising in India. There is an urgent need to mitigate the challenge posed by NCD as these account for 60% of deaths in India.¹ Further, NCD are estimated to account for slightly less than three fourths of the deaths by 2030.

The increase in prevalence of NCD is attributed to the changes in lifestyle that have come along with improved socio-economic status of the country. The current life-style pattern, characterized by an increase in harmful behaviours such as increased consumption of energy-dense foods, reduced physical activity and increased exposure to risk factors, is expected to increase the prevalence of NCD in future as well. While this pattern was believed to be prevalent in urban areas only, the rural lifestyle is also rapidly undergoing similar change, and therefore most NCD are now equally prevalent in poor and rural populations.² The rural situation is further complicated by the fact that the public health system is still gearing up to provide health services required for early identification and treatment of NCD. On the other hand, there is an immense need to create awareness in rural communities about required lifestyle changes for preventing NCD and promoting timely and appropriate health seeking behaviours.



Taking cognizance of the rural situation, ACF strategically added NCD as a focus area to its health program in 2015. ACF first conducted a desk-review and found paucity of evidence about elements critical to designing effective interventions – rural people’s awareness, knowledge and use of health services for NCD. Hence, a systematic study was conducted to understand the knowledge, attitudes and practices associated with cardiovascular diseases, diabetes, cancers, mental illnesses & women’s reproductive health problems.

The Study
Baseline-findings from a study on knowledge and use of health services for NCD in rural population

Study Design
Quasi-experimental design. Data collected from intervention villages where ACF conducted only MCH interventions prior to the study & matching control villages

Sampling
A multi-stage sampling approach used to collect information from intervention & control villages

Key Areas of Enquiry
Awareness of NCD. Knowledge of risk factors for NCD. Use of health services.

Respondents: 1440
721 male & 719 female of age 18 & above

Data Collection
Structured questionnaire developed and pre-tested for the study. Interviews conducted by professionally trained research team using tablets

Villages:
96 villages covered across 7 blocks
Chandrapur (MH) – 36
Roorkee (UK) – 18
Darlaghat (HP) – 24
Bhatapara (CH) – 18

Data Analysis
Analysis of pooled data for 96 villages. Descriptive analysis conducted using SPSS

Heart Diseases, Hypertension and Diabetes

The level of people’s knowledge about these diseases was assessed using various parameters. A majority i.e., more than 80% of the people knew the terms heart disease / heart attack, hypertension / high blood pressure and diabetes / excess sugar in blood. However, their knowledge about the nine risk factors for these diseases was poor. A ranking of perceived risk factors for the three diseases showed that four factors were identified the most – mental stress, physical stress, poor nutrition and consumption of high calorie food / lack of balanced diet. It is noteworthy that none of these four risk factors were identified by even half of the respondents in the study. Further, consumption of alcohol and tobacco, and smoking were ranked last two and were identified to be risk factor for any of the diseases by less than 5% of the respondents.

Respondents in the study self-reported whether a doctor had diagnosed them to be suffering from any of the three diseases. Only 71 respondents (4.9%) had been diagnosed to be suffering from hypertension, followed by 46 (3.2%) who were diagnosed as diabetic and 24 (1.7%) who were diagnosed to be suffering from heart disease. In the year prior to the interview, 15.6%, 14.9% and 2.7% had undergone a blood-sugar test, blood-pressure check and received an electro-cardiogram, respectively.

		Heart Problem	Hypertension	Diabetes
% Respondents aware about the disease		83.1	84	83.3
Perceived Risk Factors (%)	Rank 1	35.0 Mental stress	44.8 Mental stress	36.3 Consumption of high calorie food
	Rank 2	16.1 Physical stress	22.5 Physical stress	13.6 Mental stress
	Rank 3	13.9 Poor nutrition	19.3 Poor nutrition	11.7 Poor nutrition
	Rank 4	13.5 Consumption of high calorie food	15.2 Consumption of high calorie food	9.0 Physical stress
	Rank 5	7.4 Inadequate physical activity	9.5 Overwork	4.0 Overwork
	Rank 6	4.5 Pollution	4.2 Pollution	3.5 Pollution
	Rank 7	4.0 Overwork	4.0 Inadequate physical activity	3.1 Inadequate physical activity
	Rank 8	3.3 Smoking or tobacco consumption	2.2 Consumption of alcohol	2.2 Consumption of alcohol
	Rank 9	3.2 Consumption of alcohol	1.9 Smoking or tobacco consumption	1.8 Smoking or tobacco consumption

Mental Health

The knowledge and beliefs about four types of mental health problems were assessed in the study – depression (explained in lay terms as illness of sadness), anxiety, mania (explained in lay terms as illness of excessive happiness) and psychotic illnesses (explained in lay terms as illnesses with delusions or hallucinations). More than 60% of the study respondents knew about depression (64.2%) and anxiety (69.6%), while 54% knew about mania and illnesses with psychotic symptoms.

A deeper assessment about their knowledge was conducted by asking respondents about the curability and the causes of mental illnesses. Around one-fourth of the respondents believed that mental illnesses can’t be cured and 18.3% did not know whether these illnesses could be cured. A ranking of the perceived causes of mental illnesses showed that three main reasons were considered by around half the respondents as causes of mental illnesses. These three reasons pertained to difficulties experienced in life – stress due to day-to-day problems (55.2%), economic difficulties or poverty (46.5%) and conflicts with family members or other people (44.9%).

Percentage distribution of awareness of respondents about types of mental illnesses	
Depression	64.2
Anxiety	69.6
Mania	54.7
Illness of delusion & hallucination	54.3

Of the 1440 respondents, only 21 (1.5%) reported that a doctor had diagnosed them as suffering from any of the four mental illnesses and only 7 (0.5%) respondents had sought treatment in the year prior to the interview.

Percentage of perceived risk factors for mental illnesses		
Rank 1	Stress due to day to day problems	55.2
Rank 2	Economic difficulties or poverty	46.5
Rank 3	Conflicts with family members or other people	44.9
Rank 4	Consumption of substances like charas/afeem/ganja/bhang	32.4
Rank 5	Persons immoral deeds/bad karma	29.5
Rank 6	Black magic/witchcraft	27.9
Rank 7	Consumption of tobacco use	27.2
Rank 8	It is hereditary i.e. runs in family	26.7
Rank 9	Gods anger	21.7

Women’s Health Problems

The study included NCD that are known to be more prevalent among women which are anemia, breast and cervical cancer and women’s reproductive health problems.

Anemia: 8 out of every 10 women in the study knew about the condition of “anemia”. However, not more than one-third of all the women in the study knew about the main factors associated with anemia. Only 37.4% of the women perceived “poor nutrition” as a reason for anemia. Other factors that were considered by women included mental stress (21.4%), consumption of high calorie food / lack of balanced diet (20.2%), physical stress (14.6%) and overwork (6.8%).

Of the 719 women in the study, 26.8% reported to have undergone a blood test for haemoglobin, and only 16 (2.2%) reported that a doctor had diagnosed them to be anaemic.

Breast and Cervical Cancer: 51 of the 719 women respondents reported not knowing about the disease of “cancer”. Of the rest 619 who knew about cancer, 61.9% believed that cancer was preventable and 15.8% did not know whether it could be prevented.

“Breast cancer” was known to at least 6 of every 10 women from the study, but only 12.5% knew about breast self-examination. Only 12 women reported to have been ever checked by a doctor for breast cancer and among them only 5 had undergone a clinical breast examination and one had undergone mammography.

“Cervical cancer” was also known to at least 6 of every 10 women from the study, but only 13 women reported to have been ever checked by a doctor for cervical cancer, and among them only 9 had received a Pap test and 4 had undergone a vaginal examination.

Reproductive Health Problems: menstruation related problems and white discharge, for which women in rural communities may not seek healthcare services were included in the study.

A little more than 80% of the women in the study considered “menstruation related problems” and “white discharge” as health problems. However, only 7.6% of the 619 women reported that a doctor had told them that they suffer from either of these health problems. Overall, 37 of the 719 women had sought treatment for any of these health problem in the year prior to the interview.