

## Original Research Article

# Symptoms and perceptions of risk factors among cancer patients attending a tertiary care hospital in Chandigarh, North India

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## ABSTRACT

**Background:** With growing incidence of cancer, it is of prime interest to study views of cancer patients regarding their perceptions regarding cancer cure and its risk factors. The objective of the study was to explore opinions of cancer patients regarding the disease and perceived risk factors of various cancers.

**Methods:** Results of present study are based on part of detailed findings of ICMR sponsored project wherein perceptions and beliefs of cancer patients were explored by interview method.

**Results:** Study included 1117 new cancer patients including 501 (44.9%) males and 616 (55.1%) females representing different socio-economic classes. Spectrum of cases showed breast cancer (18.3%), head and neck cancer (10.2%) and cervical cancer (9.1%) as three major types of cancers. About 43% respondents were of the opinion that cancer can be curable and 15.0% thought it was due to displeasure of God. Symptoms of cancer perceived by them included mainly weakness and fatigue, loss of appetite and weight loss, indigestion or difficulty in swallowing as reported by 729 (65.3%), 568 (50.9%), 341 (30.5%) patients, respectively. Varied perceptions of patients regarding risk factors for different types of cancers were also reported.

**Conclusions:** The study reported several misconceptions regarding cancer and risk factors perceived by cancer patients. There is an urgent need of health education to be made an integral part of cancer cure to avoid those misconceptions of patients prevent the disease and for better treatment outcomes. More in-depth studies are required to explore further opinions and to ascertain the findings.

**Keywords:** Holistic approach, Perceptions and beliefs, Risk factors, Symptoms

## INTRODUCTION

Cancer being one of the most leading causes of death in many countries despite the advancement in cancer treatment and diagnosis, it remains a major public health problem. The world cancer report issued by international agency for research on cancer (IARC) reported that cancer rates had increased with alarming rate globally.<sup>1</sup> Cancer has emerged as a major public health problem in developing countries, matching its effect in industrialized nations. India is in epidemiological transition phase and

cancer is now one of the leading causes of morbidity and mortality. The Indian subcontinent is home to 16.5% of the world's population and at any one time it is estimated that there are over 2 million people with cancer.<sup>2</sup> The majority of Indian cancer patients have late stage incurable diseases (75%-80%) when first diagnosed.<sup>3-5</sup> Healthy lifestyles and public health action by governments and health practitioners could stem this trend and prevent as many as one third of cancers worldwide. There is high exposure to risk factors, especially tobacco, alcohol, harmful dietary factors,

infectious agents and carcinogens. Public health advocacy has been largely focused on communicable diseases, nutritional deficiencies, population stabilization and on HIV/AIDS. Cancer has thus far been a relatively low priority.<sup>6</sup> The dual burden of non-communicable and communicable diseases is stretching the already meager health resources. Increasing population with more than one-fourth living in abject poverty is further complicating the health scenarios. Whilst cancer has not been a prominent healthcare issue in India compared with other communicable diseases, with an increasingly ageing population, cancer is emerging as a critical health problem.<sup>7</sup> Cancer is a major public health problem for our country. The vast majority of cases in developing countries currently have no option for avoiding this disease, despite the fact that it is highly preventable. Early treatment of precancerous lesions is available.<sup>8</sup> Cancer patients raise several questions and challenges for the physicians. Despite of rapid advances in the field of oncology, the results of management of cancer are still not completely satisfactory. With growing incidence of cancer, it is of prime interest to study views of cancer patients. Our previous study was confined only to perceptions of cancer patients regarding spirituality and its role in cancer cure and not to their risk perceptions regarding the disease.<sup>9</sup> Present study aims at exploring opinions of cancer patients regarding the disease and perceived risk factors of different types of cancer.

## METHODS

A cross sectional survey was conducted among patients attending radiation oncology OPD of government medical college and hospital (GMCH), a tertiary healthcare facility in Chandigarh (UT), north India under indian council of medical research (ICMR), India sponsored project 'Complementary and alternative medicine (CAM) use among cancer patients' with prior approval of institutional ethics committee during June 2012 to May 2014. GMCH Chandigarh provides care to patients representing several states. Chandigarh is a highly urbanized city and western culture is adopted by a large proportion of respondents in this modern city called city beautiful of India. Chandigarh is the most economically advanced UT of India which is characterized by high population growth due to migratory population and rapidly changing life style. Here the pattern of cancer may vary considerably as compared to remaining part of India.

### Sampling design

A systematic sampling design was adapted to select patients of different types of cancer approaching for allopathic treatment at the radiation oncology OPD of the health facility. Patients with confirmed diagnosis of any type of cancer irrespective of age, gender, site and staging of cancer approaching for allopathic treatment at the studied health facility for the first time willing to participate in the study were included. Patients and their

family members/close relatives attending the health facility were interviewed to collect information on personal and family characteristics and other relevant information. Their opinions regarding causes of cancer, perceptions and beliefs regarding risk factors and practices were explored using semi-structured interview schedule. Every third patient in a systematic manner with a random start every day was included. Patients revisiting the OPD were excluded from the study. Questionnaires/schedules were filed by interview method asking questions in local/understandable language. Information was pretested and suitably modified through a pilot study. Only participants giving consent were included as per the ethical guidelines.

### Optimum sample size

Power analysis was done to calculate optimum sample size for the study. Sample size was calculated by using the following formula with approximation for large population,

$$n = \frac{Z^2 1 - \alpha / 2 (1 - P)}{\epsilon^2 P},$$

where,

P=anticipated population proportion,

1- $\alpha$ =confidence coefficient,

$\epsilon$ =relative precision,

Z=value of standard normal variate.

On the basis of anticipated 60% CAM use which was primary outcome parameter in the original project and assuming 95% confidence coefficient and 5% relative precision, optimum sample size of 1024 cancer patients was obtained. This study covered a sample of 1117 cancer patients.

Content analysis of opinions was carried out. Data analysis was carried out using IBM statistical package for social sciences (SPSS) 16 software.

## RESULTS

Total 1117 new cancer patients were surveyed from GMCH, Chandigarh including 501 (44.9%) males and 616 (55.1%) females referred from different types of hospitals. There were 721 (64.5%) patients from rural area, 396 (35.5) from urban area representing different socio-economic classes. Among surveyed patients, 204 (18.3) were suffering from breast cancer, 114 (10.2) head and neck cancer, 102 (9.1) cervical cancer, 53 (4.7) oral cancer and 16 (1.4) prostate and GIT cancer and remaining 600 (53.7) were suffering from other type of cancer.

Table 1 presents perceptions of respondent's about cancer. Respondents were of the opinion that cancer can be curable 481 (43.1%), curable at an early stage 357 (32.0%), displeasure of God 167 (15.0%) and non-curable disease 56 (5.0%). There were 1094 (97.9%) respondents said that we should consult doctor if symptoms of cancer are present and knowledge of cancer was reported mainly mass media 594 (53.2%) followed by friends 391 (35.0%).

**Table 1: Perceptions of respondents regarding cancer.**

| Opinions of respondents about cancer                        | Numbers | %    |
|---|---------|------|
| <b>Non curable disease</b>                                  | 56      | 5.0  |
| <b>Last stage of life</b>                                   | 07      | 0.6  |
| <b>Displeasure of God</b>                                   | 167     | 15.0 |
| <b>It is curable</b>  | 481     | 43.1 |
| <b>Curable at an early stage</b>                            | 357     | 32.0 |
| <b>What one should do if symptoms of cancer are present</b> |         |      |
| <b>Consult doctor</b>                                       | 1094    | 97.9 |
| <b>Will complete the treatment, if needed</b>               | 02      | 0.2  |
| <b>Leave everything on God</b>                              | 06      | 0.5  |
| <b>Consult ojha/tantrik</b>                                 | 03      | 0.3  |
| <b>Adopt/try some other therapies</b>                       | 01      | 0.1  |
| <b>Any other</b>  | 11      | 1.0  |
| <b>Source of knowledge of cancer</b>                        |         |      |
| <b>Family members/ relatives</b>                            | 373     | 33.4 |
| <b>Friends</b>  | 391     | 35.0 |
| <b>Mass media</b>   | 594     | 53.2 |
| <b>Newspaper</b>  | 352     | 31.5 |
| <b>Banners/hoardings</b>                                    | 28      | 2.5  |
| <b>Radio</b>  | 61      | 5.5  |
| <b>Any other</b>  | 126     | 11.3 |

Risk factors of cancer perceived by respondents were reported as given in Table 2. According to 235 (21.0%) respondents, cancer is caused due to pesticides present in food consumption of water containing chemicals while therapy, 28 (2.5%) high saturated fat in diet and 19 (1.7%) infertility can be the signs/symptoms of ovarian cancer.

#### **Cervical cancer**

About signs/symptoms of cervical cancer, 117 (10.5%) respondents gave views like pelvic pain, 120 (10.7%) weight loss, 108 (9.7%) abdominal vaginal bleedings, 87 (7.8%) persistence vaginal discharge, 59 (5.3%) post coital pain and bleeding, 38 (3.4%) anaemia and 30 (2.7%) smoking, 14 (1.3%) multiple pregnancies, 6 (0.5%) sexually transmitted diseases and 5 (0.4%) multiple sexual partners can be the risk factors of cervical cancer.

192 (17.2%) respondents were of the opinion that it was due to sins of misdeeds in past 60 (5.4%). Others reported causes included 21 (1.9%) hereditary and 17 (1.5%) mobile radiations. Several other misconceptions regarding the causation of the disease were also prevalent. Symptoms of cancer disease felt by them included weakness and fatigue, loss of appetite and weight loss, indigestion or difficulty in swallowing as reported by 729 (65.3%), 568 (50.9%), 341 (30.5%) patients, respectively.

Respondents were also interviewed regarding their awareness of symptoms of different type of cancers. Awareness of respondents regarding symptoms of different types of cancer are presented in Table 3.

#### **Breast cancer**

Some respondents were aware about the symptoms of breast cancer like 313 (28.0%) breast pain, 208 (18.6%) swelling in breast part, 153 (13.7%) change in shape of the breast, 147 (13.2%) breast infection, 123 (11.0%) nipple discharge, 121 (10.8%) thickness of breast, 115 (10.3%) change in symmetry of breast, 102 (9.1%) nipple tenderness, 94 (8.4%) change in skin, 93 (8.3%) change in nipple and 82 (7.3%) change in nipple size. According to them, risk factors of breast cancer included 41 (3.7%) genetic changes, 35 (3.1%) smoking/alcohol, 25 (2.2%) long menstrual cycle, 23 (2.1%) age, 15 (1.3%) being overweight, 13 (1.2%) breast density, 8 (0.7%) lack of physical activity, 5 (0.4%) radiation therapy, 4 (0.4%) early menarche and 4 (0.4%) late menopause and exposure to low level radiation.

#### **Ovarian cancer**

There were 334 (29.9%) respondents who told that patients suffered from vaginal bleeding, 248 (22.2%) from weight loss, 148 (13.2%) nausea & vomiting, 78 (7.0%) abdominal discomfort and mainly 207 (18.5%) respondents reported risk factors like irregular menses, 41 (3.7%) family tendency, 27 (2.4%) hormone replacement

#### **Oral cancer**

There were 488 (43.7%) respondents reported pain during swallowing as signs/symptoms of oral cancer. Total 468 (41.9%) respondents gave reasons like bleeding in mouth, 417 (37.3%) reported patches inside the mouth, 366 (32.8%) loose teeth, 331 (29.6%) sores on lips, 146 (13.1%) lump in the neck. Main risk factors were chewing of tobacco 664 (59.4%), cigarette smoking 604 (54.1%), alcohol 252 (22.6%), age 19 (1.7%) and sun exposure 4 (0.4%).

#### **Brain cancer**

Symptoms of brain cancer as recorded by respondents were headaches 254 (22.7%), memory loss 220 (19.7%), blurry vision 160 (14.3%), weak immune system 85

(7.6%), nausea and vomiting 70 (6.3%). Main risk factors involve cell phone usage 74 (6.6%), Radiation exposure and family heredity 15 (1.3%) and HIV 3 (0.3%).

#### Neck and head cancer

Symptoms of head and neck Cancer includes trouble speaking 558 (50.0%), pain during swallowing 472 (42.3%), hoarseness 397 (35.5%), chin swelling 382 (34.2%), paralysis of face muscles 198 (17.7%), sore throat stays for longer time 149 (13.3%), headaches 119 (10.7%) and occurrence of lump that doesn't heal 44 (3.9%). Risk factors involved chewing of tobacco 529

(47.4%), alcohol 372 (33.3%), oral cavity 136 (12.2%) and radiation exposure 14 (1.3%).

#### Lung cancer

According to respondents, signs/symptoms of lung cancer were weight loss 396 (35.5%), nausea vomiting 332 (29.7%), headaches 277 (24.8%), digestion problem 236 (21.1%), urination infection 223 (20.0%), breathing difficulties 224 (20.1%) and blood in sputum 191 (17.1%) and risk factors were smoking 522 (46.7%), second hand of smoking 293 (26.2%), air pollution 226 (20.2%) and lung diseases 126 (11.3%) recorded.

**Table 2: Gender wise awareness of respondents regarding risk factors and symptoms of cancer.**

| Knowledge regarding cancer                     | Male (N=501) |      | Female (N=616) |      | Total (N=1117) |      |
|--|--------------|------|----------------|------|----------------|------|
|  | Number       | %    | Number         | %    | Number         | %    |
| <b>Risk factors/causes of cancer</b>           |              |      |                |      |                |      |
| Consumption of water containing chemicals      | 72           | 14.4 | 120            | 19.5 | 192            | 17.2 |
| Pesticides present in food                     | 91           | 18.2 | 144            | 23.4 | 235            | 21.0 |
| Exposure to radiation                          | 05           | 1.0  | 08             | 1.3  | 13             | 1.2  |
| Mobile radiations                              | 06           | 1.2  | 11             | 1.8  | 17             | 1.5  |
| Because of human contact                       | 0            | 0.0  | 04             | 0.6  | 04             | 0.4  |
| Hereditary                                     | 04           | 0.8  | 17             | 2.8  | 21             | 1.9  |
| Sins of misdeeds in the past                   | 20           | 4.0  | 40             | 6.5  | 60             | 5.4  |
| <b>Symptoms of cancer</b>                      |              |      |                |      |                |      |
| Weakness and fatigue                           | 324          | 64.7 | 405            | 65.7 | 729            | 65.3 |
| Loss of appetite and weight loss               | 273          | 54.5 | 295            | 47.9 | 568            | 50.9 |
| Indigestion or difficulty swallowing           | 178          | 35.5 | 163            | 26.5 | 341            | 30.5 |
| Nagging cough or hoarseness                    | 129          | 25.7 | 69             | 11.2 | 198            | 17.7 |
| A sore that does not heal                      | 18           | 3.6  | 08             | 1.3  | 26             | 2.3  |
| Easy bleeding or bruising                      | 53           | 10.6 | 67             | 10.9 | 120            | 10.7 |
| Unusual bleeding or discharge                  | 29           | 5.8  | 119            | 19.3 | 148            | 13.2 |
| Constant fever or chills                       | 129          | 25.7 | 168            | 27.3 | 297            | 26.6 |
| Changes in bowel habit                         | 11           | 2.2  | 26             | 4.2  | 37             | 3.3  |
| Obvious change in the size and color of a mole | 03           | 0.6  | 05             | 0.8  | 08             | 0.7  |
| Any other (specify)                            | 274          | 54.7 | 269            | 43.7 | 543            | 48.6 |

**Table 3: Awareness of respondents regarding symptoms and risk factor of different types of cancer.**

| Awareness of symptoms of different cancers | Numbers | %    |
|--|---------|------|
| <b>Breast cancer</b>                       |         |      |
| Change in nipple size                      | 82      | 7.3  |
| Change in nipple                           | 93      | 8.3  |
| Breast pain                                | 313     | 28.0 |
| Change in symmetry of breasts              | 115     | 10.3 |
| Change in skin                             | 94      | 8.4  |
| Nipple tenderness                          | 102     | 9.1  |
| Thickening of the breast                   | 121     | 10.8 |
| Change in shape of the breast              | 153     | 13.7 |
| Nipple discharge                           | 123     | 11.0 |
| Swelling in the breast part                | 208     | 18.6 |
| Breast infections.                         | 147     | 13.2 |
| Any other                                  | 186     | 16.7 |
| <b>Risk factor</b>                         |         |      |
| Age  | 23      | 2.1  |

Continued.

| Awareness of symptoms of different cancers  | Numbers | %    |
|---|---------|------|
| Hereditary/family history                   | 20      | 1.8  |
| Long menstrual cycle                        | 25      | 2.2  |
| Early menarche and late menopause           | 04      | 0.4  |
| Exposure to low level radiation             | 04      | 0.4  |
| Genetical changes                           | 41      | 3.7  |
| Lack of physical activity                   | 08      | 0.7  |
| Being overweight                            | 15      | 1.3  |
| Smoking/alcohol                             | 35      | 3.1  |
| Breast density                              | 13      | 1.2  |
| Radiation therapy                           | 05      | 0.4  |
| Any other                                   | 109     | 9.8  |
| <b>Ovarian cancer</b>                       |         |      |
| Abdominal discomfort                        | 78      | 7.0  |
| Vaginal bleeding                            | 334     | 29.9 |
| Nausea and vomiting                         | 148     | 13.2 |
| Weight loss                                 | 248     | 22.2 |
| Any other                                   | 71      | 6.4  |
| <b>Risk factor</b>                          |         |      |
| Infertility                                 | 19      | 1.7  |
| Familial tendency                           | 41      | 3.7  |
| Irregular menses                            | 207     | 18.5 |
| High saturated fat in diet                  | 28      | 2.5  |
| Hormone replacement therapy                 | 27      | 2.4  |
| Any other                                   | 04      | 0.4  |
| <b>Cervical cancer</b>                      |         |      |
| Abdominal vaginal bleedings                 | 108     | 9.7  |
| Persistence vaginal discharge               | 87      | 7.8  |
| Post coital pain and bleeding               | 59      | 5.3  |
| Pelvic pain                                 | 117     | 10.5 |
| Weight loss                                 | 120     | 10.7 |
| Anaemia                                     | 38      | 3.4  |
| Any other                                   | 19      | 1.7  |
| <b>Risk factor</b>                          |         |      |
| Indulging in sexual activity at younger age | 04      | 0.4  |
| Multiple sexual partners                    | 05      | 0.4  |
| Multiple pregnancies                        | 14      | 1.3  |
| Sexually transmitted diseases               | 06      | 0.5  |
| Smoking                                     | 30      | 2.7  |
| Any other                                   | 45      | 4.0  |
| <b>Oral cancer</b>                          |         |      |
| Loose teeth                                 | 366     | 32.8 |
| Bleeding in mouth                           | 468     | 41.9 |
| Lump in the neck                            | 146     | 13.1 |
| Pain during swallowing                      | 488     | 43.7 |
| Sore on lips                                | 331     | 29.6 |
| Patches inside the mouth                    | 417     | 37.3 |
| Any other                                   | 37      | 3.3  |
| <b>Risk factor</b>                          |         |      |
| Age   | 19      | 1.7  |
| Cigarette smoking                           | 604     | 54.1 |
| Chewing of tobacco                          | 664     | 59.4 |
| Alcohol                                     | 252     | 22.6 |
| Sun exposure                                | 04      | 0.4  |
| Any other                                   | 45      | 4.0  |
| <b>Brain cancer</b>                         |         |      |
| Weak immune system                          | 85      | 7.6  |
| Headaches                                   | 254     | 22.7 |

Continued.

| Awareness of symptoms of different cancers | Numbers | %    |
|--|---------|------|
| Nausea and vomiting                        | 70      | 6.3  |
| Blurry vision                              | 160     | 14.3 |
| Memory loss                                | 220     | 19.7 |
| Any other                                  | 18      | 1.6  |
| <b>Risk factor</b>                         |         |      |
| Radiation exposure                         | 15      | 1.3  |
| HIV  | 03      | 0.3  |
| Family heredity                            | 15      | 1.3  |
| Cell phone usage                           | 74      | 6.6  |
| Any other                                  | 53      | 4.7  |
| <b>Neck and head cancer</b>                |         |      |
| Sore throat stays for longer time          | 149     | 13.3 |
| Hoarseness                                 | 397     | 35.5 |
| Occurrence of lump that does not heal      | 44      | 3.9  |
| Pain during swallowing                     | 472     | 42.3 |
| Trouble speaking                           | 558     | 50.0 |
| Chin swelling                              | 382     | 34.2 |
| Paralysis of face muscles                  | 198     | 17.7 |
| Headaches                                  | 119     | 10.7 |
| Any other                                  | 46      | 4.1  |
| <b>Risk factor</b>                         |         |      |
| Chewing of tobacco                         | 529     | 47.4 |
| Alcohol                                    | 372     | 33.3 |
| Oral cavity                                | 136     | 12.2 |
| Radiation exposure                         | 14      | 1.3  |
| Paranasal sinuses and nasal cavity         | 07      | 0.6  |
| Any other                                  | 116     | 10.4 |
| <b>Lung cancer</b>                         |         |      |
| Jaundice                                   | 30      | 2.7  |
| Diarrhoea                                  | 57      | 5.1  |
| Nausea vomiting                            | 332     | 29.7 |
| Headaches                                  | 277     | 24.8 |
| Digestion problem                          | 236     | 21.1 |
| Urination infection                        | 223     | 20.0 |
| Weight loss                                | 396     | 35.5 |
| Blood in sputum                            | 191     | 17.1 |
| Breathing difficulties                     | 224     | 20.1 |
| Any other                                  | 25      | 2.2  |
| <b>Risk factors</b>                        |         |      |
| Smoking                                    | 522     | 46.7 |
| Second hand of smoking                     | 293     | 26.2 |
| Age  | 15      | 1.3  |
| Asbestos fiber                             | 14      | 1.3  |
| Air pollution                              | 226     | 20.2 |
| Lung diseases                              | 126     | 11.3 |
| Any other                                  | 52      | 4.7  |

## DISCUSSION

Present study conducted among 1117 new cancer patients of various sites explored opinions of cancer patients regarding the disease and perceived risk factors of various cancers as a part of detailed project. About 43.0% respondents were of the opinion that cancer can be curable. Majority of respondents were (97.9%) were in favour of consulting doctors if symptoms of cancer were

present and knowledge of cancer was reported mainly through mass media reported by 53.2% respondents followed by friends reported by 35.0% respondents.

Present study presented spectrum of cancer of various types including breast cancer (18.3%), head and neck cancer (10.2%), cervical cancer (9.1%), oral cancer (4.7%), prostate and GIT cancer (1.4%) and other type of cancers (53.7%). Cervical cancer came out to be the

leading cancer in this study also as in India, although breast is leading cancer site globally. Over 80% of the cervical cancer present at a fairly advanced stage and around 80,000 deaths are reported due to cervical cancer in India.<sup>10,11</sup> Gastric cancer, the fourth most common type of cancer worldwide has remained an important malignant disease with significant geographical, ethnic, and socioeconomic differences in distribution. It is the second most common cause of death from cancer, with around 700,000 deaths annually (10% of all cancer deaths).<sup>12</sup> Other spectrum is also in agreement with findings of other reported cases cancer burden in India.<sup>10-12</sup>

Varied opinions of respondents were reported regarding risk factors of cancer like pesticides present in food, consumption of water containing chemicals and mobile radiations. Study reported several misconceptions also regarding the causation of the disease like it was due to sins of misdeeds in past and displeasure of God. Major symptoms of cancer felt by them included weakness and fatigue, loss of appetite weight loss, indigestion or difficulty in swallowing. Pelvic pain for cervical cancer and breast pain for breast cancer came out to be the commonest symptom reported by respondents. Knowledge regarding risk factors of all types of cancer except for oral cancer came out to be very low in this study. There is lack of literature on perceptions of patients regarding cancer and its risk factors, particularly in Indian contexts. Our previous study based on the detailed project reported that 97.2% respondents had faith in God and faith in God was reportedly increased after suffering from the disease of 68.8% respondents. That study too remained silent on risk perceptions of cancer patients regarding the disease.<sup>9</sup> Results could not be compared with results of earlier studies due to lack of literature.

The main weakness of our study is that it was confined only to patients undergoing allopathic treatment for cancer at the health facility. Therefore, it doesn't represent awareness and perceptions of patients in the general community. Moreover, it can't ascertain the causal relationship between awareness and extent of disease reduction. Further in depth interventional studies are required to be conducted to overcome these shortcomings.

## CONCLUSION

The study reported several misconceptions regarding cancer and risk factors perceived by cancer patients. It is concluded that increasing awareness of symptoms and risk factors of cancers is very important, and it should be introduced in medical practice for effectively addressing the issues related with care of cancer patients. There is an urgent need of health education to be made an integral part of cancer cure to avoid those misconceptions of

patients to prevent the disease and for better treatment outcomes in a holistic manner. More in-depth studies are required to explore further opinions and to ascertain the findings in general community.

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