



DEPRESSION AND ANXIETY AMONG CANCER PATIENTS -A LONGITUDINAL STUDY

Psychiatry

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ABSTRACT

Depression is a one of the most prevalent comorbidities in cancer cases which affects almost more than 10% of patients. A diagnosis is life-changing, and is a source of considerable psychological trauma and stress. Here we conducted an observational study to assess the patterns of change in anxiety and depression among cancer patients. There was significant improvement in anxiety and depression following successful treatment.

KEYWORDS

INTRODUCTION

Depression is a one of the most prevalent comorbidities in cancer cases which affect almost more than 10% of patients^[1]. A diagnosis is life-changing, and is a source of considerable psychological trauma and stress^[2]. Choosing the antidepressants is very vital, given the common side effects of chemotherapy (such as nausea), and the necessity to avoid serious interactions, including reducing the effectiveness of chemotherapeutic drugs^[3]. The probable connection between the chronic stress response, which may predispose patients to depression, and the risk of mortality from cancer has been explored^[4]. The complex pharmacokinetic and pharmacodynamic interaction between the endocrine, nervous and immune systems continue to be elucidated which offer the opportunity for the development of more rapid and efficacious treatments for depression in cancer in the future^[5].

Methodology

257 patients recently diagnosed with cancer of various types were evaluated for depression and anxiety using Hamilton Depression Rating Scale 21 item version and Hamilton Anxiety Rating Scale before start of any treatment modalities in the form of surgery, chemo or radiotherapy. They were evaluated after one year and depression and anxiety were evaluated using the above mentioned scales during which they underwent treatment modalities as mentioned above. Analysis was done using SPSS 21 software.

RESULTS

Table 1: Distribution of Sample as Per Gender

Total sample	Males	Females
257	185	72

Table 2: Distribution of Sample as Per Type of Carcinomas

Distribution of total sample	Type of cancer
135	Bronchogenic carcinoma
66	Oral Carcinoma
56	Other carcinomas

Table 3: Distribution of Sample as Per Type of Treatment Modality Received

Distribution of total sample	Type of treatment modality
64	Surgery
175	Surgery plus radio or chemotherapy
18	Only chemotherapy

Table 4: Distribution of Sample as Per HDRS 21 Scale During First Visit

Total sample	Those with HDRS 21 score above 20 in first visit	P value
257	240	<0.01

Table 5: Distribution of Sample as Per HDRS 21 Scale After 1 Year

Total sample	Those with HDRS 21 score above 20 after 1 year	P value

257	20	<0.01
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Table 6: Distribution of Sample as Per HAM A Scale During First Visit

Total sample	Those with significant HAM A score in first visit	P value
257	245	<0.01

Table 7: Distribution of Sample as Per HAM A Scale After 1 Year

Total sample	Those with significant HAM A score after 1 year	P value
257	18	<0.01

DISCUSSION

Clinical depression and anxiety are two of the most prevalent mental health issues in current population^[9,10]. Their incidences are even more in those suffering from terminal illness like cancers^[11]. There are many postulated mechanisms behind the same; one being the neurochemical changes that occur secondary to any terminal illness in the system; one being activation of various panicogenic circuits in the body due to the direct as well as indirect effects of the illness^[12,13].

Coming to our study, male dominance was found in the sample which is going in sync in the studies done in the past^[14]. We selected patients mostly with the two of the most prevalent cancers in our country in the form of bronchogenic carcinoma and oral cancers^[12]. We grouped the rest into the others section.

Our study was done in collaboration with the oncology department and we made all the combinations of the treatment types they went through during analysis.

Both HDRS 21 and HAM A scores were statistically significant during the first visit to us. Probable causes have been discussed above and adding up to it one notable reason that we found out in our population was increased care giver burden as the males were mainly the only the bread earners in their family. Such perspective was also shared in various studies in both Indian and world scenarios^[15]. Looking into the socio economic background of the patient profile that were included, this reason was one of the likeliest.

After an year of proper treatment and significant clinical improvement, HDRS 21 and HAM A scores were significantly low in majority of them. This explains a temporal association between the stress and anxiety generated due to carcinomas and the degree of clinical depression and anxiety among them which is also supported by prior studies^[16].

CONCLUSION

Clinical depression and anxiety are two of the most common comorbidities in patients suffering from cancer. These can worsen the

already debilitated mental state of such cases and their caregivers. Proper psychological interventions should be taken to identify and treat such ailments in such patients.

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