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The Journal is printed on acid free paper.

Editorial Office
Dr. Nagraj G. Huilgol
Division of Radiation Oncology
Dr. Balabhai Nanavati Hospital
S. V. Rd, Vile Parle (W), Mumbai - 400 056, India
Tel. 91 22 26182255 ext 618,
Telefax (direct) 91 22 26119363
E-mail: nagrah@vsnl.net

Publications Office
Medknow Publications
Phone: 91-22-6649 1818 / 1816
E-mail: publishing@medknow.com
Web: www.medknow.com

Websites
http://www.cancerjournal.net
http://www.journalonweb.com/jcrt

Official publication of the Association of Radiation Oncologists of India
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Methods of intervention in reducing the psychosocial impact while dealing with cancer as a disease: A clinician’s point of view

ABSTRACT

Aims and Objective: We searched for the clinically relevant suggestions, recommendations and findings amongst the papers on Psycho-oncology. The term clinically relevant for us meant ‘practical and implemental modes of intervention that contribute but would not affect or interfere with the normal functioning of the present system and treatment modality of the patients.’ Our intention was to use the available information for the benefit of our patients.

We also searched for the data that would prove the significance of these methods. In most parts of the world it is not possible to involve a psychologist at every level of cancer care. Based on the findings, we intend to carry out our own project for the psychosocial intervention in cancer patients and make suggestions that could be adopted even by those who have little or no experience in psychology.

Conclusion: The field of psycho oncology is a relatively new and evolving subspecialty of oncology and psychology at the same time. Current data and papers, which would make simple and implemental modes of intervention at psychosocial level, are limited. There is a dire necessity of solid data and list of suggestions to the specialists, non-specialists and to those who take care of the cancer patients, to enhance the care they provide to the cancer patients.

KEY WORDS: Cancer, psychosocial impact, psychological intervention, role of psychology for clinical benefit

INTRODUCTION

We, at the department of oncology and radiotherapy at faculty hospital in Hradec Kralove strive to work for benefit of the patients; we believe that even little changes and findings could mean a significant degree of relief for the patients. Amongst other treatment modalities, psychology too is going to play a major role in the holistic treatment of cancer patients in future. A somatic disease or an illness affects the person not only biologically, but also has a degree of psychological effect. The level of the diseases or the seriousness of the somatic problem is associated to the levels of the psychological effect.[1] The psychological distress is not only limited to the patients but also exerts its effect on the caregivers and those associated to the patients. There are instances that the caregivers of the patients needed psychiatric help to cope with situation.[2]

The impact, which the disease has, is directly proportional to the seriousness of the disease. And even the mention of the disease “CANCER” strikes terror in the minds of the individuals. The primary cause of this fear is the fact, that cancer as a disease has lesser possibility of cure than the other diseases under normal circumstances. The clinical practice also indicates the increased level of stress as a result of social factors like increased financial burden and worries for the loved ones. These preliminary findings suggest that psychosocial support for family members is not fully delivered and development of a comprehensive support system for caregivers of cancer patients is needed.[3] When the effect of cancer was studied on those in the vicinity of the patient, it was found that most commonly the family of the patient acts the as the primary care-provider for the patient with cancer. The previous studies have suggested that approximately 10-30% of family members experience some form of psychiatric morbidity.[4]

There have been studies to find out the exact nature of the effect and also the grade of these effects on the well being of the patients.[5] Several parameters have been identified to define the process.

MATERIALS AND METHODS

We were looking for the latest available data that would allow us to adopt or analyze the method by which we could intervene at the psychosocial level while treatment of our patients. The source
of information was the archives of international publications through the Pubmed website.

The criteria to select a paper - we selected a few important headings depending on the priority in treatment which occurred in the publications and divided the papers and the findings depending on them. We then tried to find if they pointed out to a certain mode of intervention to be adapted by the Cancer centers like ours that have budgetary restraints and where psychooncology is still in developing stages. The term clinically relevant meant - clinical applicability with ease, by the specialists, the general physicians and cancer care providers, without or with little background in psychology. The papers, which could be interpreted by the caregivers with little or no psychological background were selected and others were discarded.

The findings
The analysis of the currently available articles helped use categorize the areas of special interests in the papers. We found that there were certain suggestions and findings recurring in the studies all over the world.

Spirituality
One's spirituality or religious beliefs and practices may have a profound impact on how the individual copes with the suffering that so often accompanies advanced disease. Negative religious coping (i.e., statements regarding punishment or abandonment by God) was positively associated with distress, confusion, depression and negatively associated with physical and emotional wellbeing, as well as quality of life. Cancer patients with both religious and spiritual attitude were more successful in the search for meaningful support and these spiritual and religious attitude had a stabilizing effect on patients who had these attitudes. Knowledge of a patient's spirituality can help service providers predict aspects of psychosocial needs and to respond sensitively and appropriately but there was no concrete suggestion about the clinical use of the studies. The role of spirituality amongst the caregivers was ignored.

Quality of life
Quality of life is without doubt the chief question and it has been addressed in several papers. We tried to find if there were studies telling more about modes of intervention which could be used (according to our definition of clinical relevance). The questions, which have gained importance in various studies, try to cover all major factors affecting the well being of the patients. The review of questionnaire in studies revealed that, questions address issues including cancer, health, fertility and sexual concerns. The study also suggest that the repeatability of the questionnaire should be assessed but again the aim was assessment. The literature indicate that the quality of life should be given a priority in putting forth the psychosocial problems. The papers also suggest the need to act against the factors affecting the quality of life. The burden of cancer is often manifested in psychosocial dysfunction, which can have a negative impact on quality of life, however it would depend on the caregiver how he deals with the burden of cancer. Few studies have employed a qualitative methodology to explore quality of life issues for cancer patients, a review about the patients of colorectal carcinoma concluded certain repeatable themes amongst these, making sense of the cancer experience; and coping strategies seemed to attract our attention. However the ambiguities of the questions (especially for people with a limited exposure to practice of psychology) limit the scope of implementing them for intervention, probably because of time restraints and a know-how restraint.

Adjustment issues
When we tried to acquire data, which would suggest the interventional methodology with the adjustment issues, it was found that the impact was also correlated to the adjustment levels of the patients and the family members; there was a difference in adjustment levels of subject depending on their personality and the stage of a disease.

Those who are not able to cope present with a difficult situation, maladjustment can itself become a major problem. Research suggests that an altered self-image may emerge in those who have difficulty adjusting. Structured group exercise program is feasible, safe and well-tolerated by adult patients with cancer and may have positive effects on CRF and QOL. We confirmed from our staff including the nurses that they would like simplified recommendations which would allow them to deal with the maladjustment of patients and their relatives.

Sexual life
The sexual well being and the effect on the sex life of the patients and the partner are major criteria to be considered when we talk about the holistic wellbeing of the people involved. The sexual problems associated with the disease and the change in body image also has a role in the psychosocial management.

A very interesting study by Wimberley seems to suggest some important findings. According to this study, partner initiation of sex predicted greater marital satisfaction; partner adverse reaction to the scar predicted less marital satisfaction. Few researchers rated quality of the first sexual experience after treatment predicted less distress. The pattern suggests those women’s impressions of their partners’ emotional involvement after surgery for breast cancer forecast their adjustment in sexual, marital and emotional arenas over the following year. The effect of the disease has also been the highlight of various studies. The efforts of pinpointing the effects and the points of intervention have been made. There are significant well-defined reports on the issue. There are several other exclusive suggestions which attracted us. The Gaugler et al. study analyses the caregivers from feelings of

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exhaustion, role entrapment and loss of intimacy with the cancer patient. The possibility of dealing with these stresses should be recommended and would be welcome. The critical role of grownup offspring of cancer patients deserves further investigation. The Mosher et al study suggests that future research should examine the relations between intra psychic and contextual factors that may influence psychological adjustment to parental cancer. [15]

The Wellish DK study on the pediatric group of patients, suffering from malignant disease pointed the positive role of the activities such as the camping and outing. The Hodgkinson et al., study promises to identify the unmet supportive care needs in cancer patients. [17]

RESULTS

From the literature available in the journals and the search engines online, we find that amidst the huge pile of work on the matter of psychosocial wellbeing of the patients and the psychosocial well being of those associated with the patients, very few, if any, papers have conclusively suggested measure and points of intervention. Most of the works were successful in identifying the ill effects on the psychosocial wellbeing. However the suggestion that these papers were making required an overhaul of the current functioning of the clinic. There were very few papers, which could define the extent of penetration of the psychosocial impact. The precise depth of the penetration in the people associated to the patients is seldom addressed. Curiously the number of studies among the patients of Eastern European regions and Asia (except Japan) seem to be limited. [6-9, 11-13, 15]

Thus the available studies and the reviews show that the study of psychosocial impact of malignancy is necessary in order to tailor the treatment of patient with a holistic approach. But the factors, which are to be taken care of, have vaguely defined. [6, 7, 18-20]

Physicians and doctors would find it difficult to find concrete suggestions for psychosocial intervention. It is difficult to make suggestion that could be implemented by those who have little or no background in psychology. [17]

In our opinion it is of unequivocal importance, to define and suggest the ideas for the psychosocial wellbeing of the individual directly or indirectly linked to malignant disease mandate a concrete work in that direction. There should be substantial and concrete recommendations to the clinicians and all those concerned with the wellbeing of the cancer patients and about the methods to intervene at the psychosocial aspect of cancer without compromising the medical treatment and in fact supporting it.

(The study was carried as a part of the proposed project to find the levels of intervention for the psychosocial distress due to cancer, to be undertaken at the Department of Oncology and Radiotherapy for the year 2006/07)

DISCUSSION

Although a phenomenon well-recognized, little is known about many factors that influence or impact psychosocial dysfunction in individuals with specific cancers. Even less is known about the effective management of psychosocial dysfunction. [16] Despite the possible overall benefits, psychosocial screening has not been implemented in routine clinical practice. [18] There are certain studies concentrating on the method’s and level of intervention like a study that tried to find about the role of simple measure like audio tapes for patients in order to find the difference of consent for clinical trial. [21] These could probably mean that an audiotape could also be used for patient information and psychological benefit. [22]

The study of these psychosocial factors is all the more important when it comes to dealing with the patients of pediatric age group. Since the levels of emotional involvement are higher than normal, a closer scrutiny of the factors is all the more important. The Visser et al. study highlighted the psychosocial dysfunction but added that, while quantitative studies reported especially disturbed emotional functioning, qualitative studies reported problems in all domains of child functioning. Well-designed studies are needed to gain more insight into the psychosocial functioning of children of cancer patients in order to develop tailored care. [22] As the numbers of pediatric cancer survivors increase, psychosocial researchers will be better able to conduct longitudinal studies not only of adjustment and its predictors but also of the impact of the emerging medical treatments and interventions to ameliorate late effects of treatment. [23]

The women with certain kinds of cancer form a different group. The results in Kim et al. study support the application of cognitive processing models for understanding variability in women’s psychological adjustment to their family history of breast cancer. [24] Despite the large number of studies on the impact of psychosocial factors on breast cancer progression, there is no certainty about the contributing factors or processes involved. [20] The presence of risk factors like the BRCA gene evokes a generalized worry and anxiety, in the Watson study. The data show persistent worry in younger female gene carriers and confirm changes in risk management consistent with carrier status if the family member are considered, adjustment disorders and major depression are most common. It is interesting that these disorders are also well known as the most common psychiatric disorders among cancer patients. [4, 26] The adjustment with the distorted esthetics is a major issue for women. Research suggests that an altered self-image may emerge in those who have difficulty adjusting. [11] A Japanese study had concluded that, most of the family members of the patients suffering form cancer had been referred for a psychiatric consultation because of depression followed by anxiety/fear at their own request for referral sleep disorder and psychiatric evaluation. [19]
On the analysis of the published papers we were able to enlist a few of the different emotional parameters, which were observed in the patients and in those who were associated to them are demonstrated in the Table 1.

The factors which could be analyzed as affecting the depth of the impact in the patients and which could have a potential to suggest methodology of interfering in psychosocial wellbeing of patients could be enlisted as follows: Spirituality or religious beliefs and practices, Distress, Confusion, Depression, Fertility and Sexual concerns, Quality of life, Distress, Psychosocial needs, parental care and care by the children. However we think that the present modality of intervention is too complicated to be adopted by the system because of the costs incurred and manpower needed.

The significance of a psychological intervention has been repeatedly emphasized and has been recommended particularly at the end stages. Previous research has demonstrated a need to improve patient-physician communication around advance care planning.[27] Despite agreeing on various issues there is a absence of a check list for psychosocial problems in the practice of oncology.[10] The findings in studies suggest that caregivers in the families of lung cancer patients, particularly spouses, are placed at a high risk of developing psychiatric disorders especially during the terminal phase and that these family members may well be candidates for screening for psychological distress.[19] There were studies suggesting certain techniques like relaxation. According to the results of a study, relaxation training should be implemented into clinical routine for cancer patients in acute medical treatment.[28]

A review confirms the efficacy of education, individual psychotherapy, group interventions and behavioral training in reducing disease-related and therapy-related symptoms, depression and anxiety, thus improving psychological functioning and the quality of life.[29]

Little attention has been directed towards identifying and addressing the psychosocial needs of ethnic minority and underserved cancer patients.[30] There are few encouraging studies, like the one by the Hodgkinson study, which probably would guide the caregivers in following the recommendation.[17] The earlier papers have categorically stated that cancers should be treated as a family problem and a family issue. Family members should be considered as ‘second order patients’.[31,32] Cancer survival is affected by a complex combination of psychosocial factors, among which minimizing predicts a favorable prognosis and anger, no expression and escape behavior an unfavorable prognosis.[30]

**REFERENCES**

16. Wellsik DK, Crater B, Wiley FM, Belin TR. Psychosocial impact of...

Source of Support: Nil, Conflict of Interest: None declared.