ABSTRACT

Background:

Current cancer Pain management programs predominantly address the sensory and nociceptive aspects of pain though it is construed as a multidimensional concept having affective and cognitive components. Majority of the existing studies are outcome related neglecting the large number of process variables which include pain cognitions, Coping, Quality of Life, death anxiety etc. which are believed to have a moderating effect on cancer pain experience. Cancer pain syndromes originate either as a result of disease or treatment. Intervention for pain in adult cancer patients has centered almost exclusively on chronic disease related pain. There is a dearth of studies on acute treatment related pain. Moreover psychological intervention for cancer pain are characterized by lack of control groups, by small sample size and by failure to use both quantified measures of pain and to investigate process variables.

Aim of the study

The current study is aimed to investigate the effectiveness of various psychological treatments in the management of cancer pain.

Methods

A non randomized experimental study having two independent groups with Pre and post treatment assessment was conducted. Sixty six patients satisfying the inclusion and exclusion criteria were recruited from 2004 August to 2009 December to the experimental and control conditions after screening 301 participants from both units of Shirdi Sai Baba Cancer
hospital Manipal. 32 participants were recruited to the experimental group and 34 to the control group.

All the participants recruited in the Experimental and Control groups were assessed on predetermined measures. Subsequent to the pretreatment assessment, participants from the experimental group received 12 to 15 sessions of psychological intervention which involved cognitive and behavioral techniques. Participants from the control group received equivalent number of interaction from the therapist with no active interventions. Post treatment assessment was conducted for twenty four participants from the experimental group and twenty six from the control groups. Follow up assessment was conducted three months after the post treatment assessment. 18 patients from the experimental group and 20 from the control group completed follow up assessment.

**Statistical analysis**

The data was treated with SPSS version 16. Groups were compared on all socio demographic and clinical characteristics. Chi-square, t test and Man whitney U test were used for this purpose.

Repeated Measure ANOVA with generalized estimating equation was used to analyze the pre and posttest assessment of experimental and control groups with respect to various outcome as well as non outcome measures. Repeated measure ANCOVA with generalized estimating equation was used to examine the interaction of analgesics on various outcome measures.
Results

On analysis, groups were found to be comparable. Significant change following intervention was observed in only one (evaluative component) out of the eight pain outcome variables studied. The experimental group showed marked improvement in pain cognitions ‘control’ and ‘medication’ at post treatment assessment Significant change following intervention was found on two of the adaptive coping strategies, ‘instrumental social support’ and ‘planning’ in the Experimental group. In contrast to what was expected, sensory and affective components of pain did not correlate with the duration of illness. The intervention did not have any specific effect on the sensory or affective components of pain. The intervention did not show any difference with respect to the pain type. Some of the pain outcome measures were found to have significant relationship with pain cognitions and death anxiety. The study also found significant correlation between outcome measures and coping strategies.

Conclusion

Sensory and affective components did not change after psychological intervention. However significant improvement was found with respect to cognitive components. Alterations in pain cognitions and coping strategies were evident following intervention. The study also revealed significant relationship that existed between pain and other correlates such as pain cognitions Quality of life, coping, death anxiety.