Coping Stategies in a Group of Cancer Affected Egyptian Patients

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40 patients diagnosed to have leukemia or lymphoma were recruited from inpatient department of national cancer institute and subjected to psychiatric clinical assessment, SCL, POMS, NSSQ and dealing with illness coping inventory. We aimed to study coping processes, amount and type of support and psychiatric co-morbidity. Results revealed a high level of social support, especially emotional support, patients suffered from depression, fatigue and anxiety the most and 42.5% had adjustment disorder with mixed anxiety and depression. Active cognitive coping was the most coping strategy used regardless of different variables studid. Passive resignation was the most specific strategy used. Higher education level and urban culture use more coping strategies. There is a significant relation between the amount of psychological distress and the amount of coping.

(Egypt.J. Psychiat., 1999, 22: 247 - 255).

INTRODUCTION

Advances in detection and treatment have transformed cancer from a nearly uniformly fatal disease to one that is often curable (Tross and Holland, 1990).

The description and monitoring of psychological sequelae among patients who have come so close to the prospect of death is now gaining importance. The traditional role of the consultation liaison psychiatrist to determine the presence or absence of psychiatric co-morbidity in the form of depression, anxiety, organic brain disorders or any other form of psychopathology is no longer sufficient. The concept of the quality of life, coping with a life threatening disease and associative stressful events are increasingly becoming the focus of attention (Tope et al, 1993). Disruption occurs in relationship, disability interferes with achievement of age-appropriate career and personal goals (Lesko, 1990). The threat of cancer requires that the ill person devotes his/her physical and cognitive abilities to preserves physical and psychic integrity. For many years, there has been interest in how people cope with cancer. Important descriptive studies were completed in the 1950's (Bard and Sutherland, 1955; Quint 1965).

Emphasizing unconscious defenses such as denial and maladaptive coping patterns. The central issue in coping is "adaptation" (White, 1974) for which the development of new strategic maneuvers and instrumental behaviors are required. Coping types include problem focused or instrumental coping, appraisal focused coping and emotion-focused or palliative coping (Folkmas

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and Lazarus 1980; Moos & Shaeffer 1984).

This study intends to search into the coping process covering amount, quality and the use of different coping strategies in a group of Egyptian patients suffering from cancer. The amount of support offend to those patients, psychiatric comorbidity within the context of coping process.

SUBJECTS AND METHODS

Forty patients diagnosed to have Leukemia or lymphoma selected from in patients department of National cancer institute in Cairo. Cancer institute recruits patients from all over Egypt. Patients age ranged ranged from years 19-45 and both sexes were included.

Procedure

Each patient was subjected to the following

A semi-structured interview covering personal, sociodemographic date, assessment of type of social support i.e. emotional instrumental and informational and informational, type of treatment received, impact of illness on family. Finally reached psychiatric diagnosis according to DS-IV criteria.

Psychometric tools to measure (1) psychiatric co-morbidity using symptom cheekiest (SCL), and Profile of Mood States (POMS).

(2) Norbeck scial support questionnaire and (3) Dealing with illness coping inventory.

Statistical procedure included a retrospective analysis finding means, standard deviation. t-test, ANOVA and comparison of percentages using chi-square and stepwise multi regression analysis for possible interactions between variables.

RESULTS

Our sample included 40 patients recruited for inpatient department of National Cancer institute in Cairo, diagnosed with leukemia and lymphoma. Their age ranged from 19-45 years (mean 30.8+ 7.5 years), mean duration of illness. 10.21 months and all were on chemotherapy. There were 22 males (55%) and 18 females (45%, 14 were single (35%) and 26 married (65%) 21 patients (52%) reached university education, 12 (30%) were illiterate, 5 (12.5%) had primary level of education and 2 (5%) secondary education. 15 patients (37.5%) were manual workers, 14 (35%) Jobless, 5 (12.5%) clerk work, 3 (7.5%) professionals and only 3 (7.5%) were students.

1/2 of the sample (50%) came from urban and the other half from rural areas.

Regarding current psychiatric diagnosis, 17 patients (42.5%) fulfilled DSM IV eriteria of Adjustment Disorder with mixed anxiety and depressed mood; although only 3 patients (7.5%) reported past history of similar psychiatric symptoms.

As for social support 39 patients (97.5%) received eotional support, 29 (72.5%) instrumental support and 6 patients (15%) had informational support and only patient (2.5%0 had no support.

As Table (2) reveals, active cognitive coping was the most used among the sample followed by active behaviour then avoidance of the coping strategies passive resignation scored the highest mean.

Correlative studies as shown in Table (3), we found a highly significant relation between culture urban or rural with active cognitive coping (0.009), active behavioral coping (0.002) with total of dealing with illness coping inventory

(0.001). Patients coming from uban culture used more coping strategies generally and more active cognitive and active behavioral coping specifically. A highly significant relation between the level of education and active coping (0.0001) as well as the level of education and active behaviour coping (0.001). University students or graduates used more active cognitive and active behavioural coping strategies than all other groups.

Correlative studies revealed neither significant relation between age of the patient and the development of psychiatric symptoms in POMS and SCL nor dealing with illness coping inventory. Negative relation between duration of illness and all coping strategies especially passive resignation. We found no significant relation between each of sex and marital status with POMS, SCL and dealing with illness coping inventory.

Our Study revealed significant relation between symptom checklist total (Global severity index) and the total coping inventory general (0.53) active cognitive (0.43) and avoidance coping (0.34). But of the 8 strategies only 5 showed significant relation to Global severity index, these are cognitive positive understanding (0.34), active reliance on others (0.31) and distraction (0.27). Multiple regression analysis revealed the only factor with direct effect on SCL total (Global severity index) was dealing with illness total score (cope total) pointing to a directly proportionate relation psychiatric symptoms and coping total.

Table (5) through multiple regression analysis, all coping strategies were significantly related with active cognitive coping method except avoidance solitary behaviour, distraction and active reliance on others. Of the different active cognitive coping strategies, cognitive positive understanding was the most used. All coping strategies were significantly related with active behavioural method except distraction, cognitive positive understanding and avoidance solitary behaviours. Of the different active behavioural coping strategies, active expressive was the most used.

Table 1
Descriptive Statistcs of Results of NSSQ, SCL and POMS

Test	Mean	SD	Test	Mean	SD
NSSQ	29.63	1.15			
SCL			**POMS**		
Psychoticism	0.01	0.52	Fatigue	1.87	0.85
Somatization	0.46	0.37	Confusion	1.62	1.33
Obsessive compulsive	0.41	0.29	Depression	1.23	0.76
Interpersonal sensitivity	0.75	0.41	Anger	0.82	0.64
Depression	1.79	0.48	Anxiety	1.19	0.62
Anxiety	0.36	0.31	Vigor	0.83	0.66
Hostility	0.20	0.32			
Phobic anxiety	0.25	0.23	Total	7.56	3.18
Paranoid ideation	0.25	0.36			

Table 2
Descriptive Statistics of Results Related toDealing with Illness Coping Inventory of 40 Patients

	Mean	SD
Coping Methods		
Active cognitive	2.48	0.44
Active behavior	1.86	0.37
Avoidance	1.66	0.31
Coping Strategies		
Active positive involvment	1.04	0.35
Active expressive	2.16	0.52
Active reliance on others	2.34	0.58
Cognitive positive understanding	2.36	0.58
Cognitive passive ruminative	2.59	0.69
Distraction	2.27	0.81
Passive resignation	3.05	0.75
Avoidance solitary behavior	1.14	0.34
Total	5.10	0.91

Table 3
Impact of Culture and Education on Coping and Psychiatric Symptoms

		Cognitive Coping	Behaviour Coping	Avoidance Coping	Cope Total	POMS	SCL
- Culture		2.64**	2.02**	1.74	6.40**	7.86	3.80
. Urban		2.31**	1.70**	1.59	5.60**	7.26	3.20
. Rural		2.47	3.01	1.57	3.04	0.59	1.05
t		0.009	0.002	0.06	0.0001	0.28	0.15
p							
- Education							
. illiterate	(n = 12)	2.23**	1.60*	1.71		8.49	3.67
. primary	(n = 5)	2.40**	1.73*	1.50		7.06	3.10
. secondary	(n = 2)	2.70**	1.80*	1.45		8.09	2.85
. University	(n = 21)	2.64**	2.04*	1.69		7.10	3.57
F.		4.27	5.76	1.65		0.39	0.91
P.		0.0001	0.001	0.18		0.81	0.47

Table 4
Comparison Correlation Related to the Impact of Different Types of Social Support on Coping & Psychiatric Symptoms

	Cognitive Coping	Behaviour Coping	Avoidance Coping	POMS	SCL
Instrumental Support					
With	2.45	0.84	1.65	8.06	2.80
Without	2.49	1.86	1.67	7.37	3.76
t	- 0.24	- 0.19	- 0.19	0.61	-0.15
p.	0.40	0.43	0.43	0.27	0.06
Informational Support					
With	2.46	2.21**	1.66	7.67	3.49
Without	2.59	1.80**	1.69	6.91	3.53
t.	0.43	1.87	0.20	0.58	0.21
p.	0.25	0.005	0.41	0.30	0.48

*p <0.05

**p <0.01

Table 5
Results of Multiple Regression Analysis between Coping Methods & the Coping Strategies

	Cognitive Coping		Behaviour Coping		Avoidance Coping	
	P.	r^2	P.	r^2	P.	r^2
Coping Strategies						
- Active positive involvement	0.05	0.10*	0.00	0.41*	0.02	0.14*
- Active expressive	0.05	0.09*	0.00	0.49*	0.01	0.19*
- Active reliance on others	0.80	0.002	0.00	0.31*	0.32	0.03
- Cognitive positive understanding	0.00	0.52*	0.21	0.05	0.17	0.05
- Cognitive passive ruminative	0.01	0.19*	0.00	0.24*	0.00	0.22*
- Distraction	0.44	0.02	0.16	0.06	0.38	0.02
- Passive resignation	0.03	0.13*	0.03	0.12*	0.00	0.43*
- Avoidance solitary behavior	0.22	0.04	0.67	0.005	0.45	0.02

*p < 0.05

**p <0.01

All coping strategies were significantly related to avoidance coping method except active reliance on others, cognitive positive understanding, distraction and avoidance solitary behaviours. Of the different avoidance coping strategies, passive resignation was the most used.

DISCUSSION

This work intended to assess and study the coping process in a sample of Egyptian patients with lymphoma and leukemia. The effect of demographic variables on patients' coping, the social support offered and its relation to coping process in addition to associated psychiatric co-morbidity. The mean age of the patients was 30.8 years. Like Carver et al (1993), statistically significant relation was neither found between age and coping nor psychiatric symptoms. Of the sociodemograogic variables studied, education and culture were only significantly related to coping. The higher the education the more is the use of active cognitive and active behavioural coping. Spitter et al (1995) said that less education was related to distancing and more cognitive escape-avoidance.

Educated people rely on problem focused coping and less avoidance to deal with their problems (Moos, 1981). The use of more active cognitive and behavioural coping by urban patients than rural ones is related to the lower economic status in rural areas with greater exposure to stress and poor adaptation abilities. the impact of higher education level in urban patients is an additional factor. The relation between marriage, sex of the patient and coping is controversial. In our study, they did not significantly affect coping of cancer patients.

It is assumed that coping strategies are usually more prominent early in crises and decrease as time passes (Carver et al, 1993 and Hobfall, 1989). This assumption was only significant, in this study, to passive resignation strategy.

Considerable research exists to substantiate the observation that interpersonal environment of the patient with cancer is of paramount importance in adapt (Bloom, 1982 a, 1982, b).

Abdel Azim et al (1997) reported improvement in pain and depression scores in cancer patients who received psychological interventions that allowed more support and more ability to cope with pain. 97.5% of patients in our study received emotional support leaving no patients for comparison, 72.5% (n = 29) of patients received instrumental support and only 50% (6 patients) received informational support denoting deficiency in providing information to patients, giving guidance and advice and teaching patients problem solving skills.

As suggested by Dodd et al (1985) our patients receive rather large social support, primarily emotional, offered by the family members rather than information and tools in problem solving skills offered by physicians.

The more patients experience psychological distress, the more is the call for using coping strategies. In addition to emotional distress, cancer constitutes a threat to physical and psychic integrity (Hamburg, 1974) that the ill person devotes cognitive activities to preserve both physical and psychic integrity. A significant relation between SCL and dealing with illness coping inventory supports this assumption.

Active cognitive coping, an emotion focused coping was the most used by patient regardless of different variables; followed by active behavioural and lastly avoidance coping. Using the same coping inventory, Namir et al, (1987)

found similar results in AIDS patients, pointing to the assumption that it is the life threatening disease, rather than the nature of it that indicates the nature of coping mostly used. Unspite of the fact that avoidance coping was the least used, we found that passive resignation, one of the former's components, was the most specific coping strategy used. An explanation might be that distancing specifically, is a frequent coping strategy. Within active cognitive coping, cognitive positive understanding strategy was the most commonly used. As for active behavioural coping, active expressive was the most.

One has to point to psychiatric comorbidity associated in a high percent of cancer patients; 42.5% of them received DSM IV diagnosis of Adjustment Disorder with mixed anxiety and depression; Derogates et al (1983) found approximately 47% and abdel azim et al (1997) found 55% op patients of different cancer diagnosis. An obvious environmental stressor, namely a life threatening disease i.e. Cancer, is etiologically related and recent studies implicated these findings and assumed that distress experienced by cancer patietns tends to be situational, transient and not representative of severe psychopathology (Tope et al, 1993).

Patient scored highest on depression in SCL (mean 0.79) followed by interpersonal sensitivity (0.75) then somatization (0.46). According to Tope et al (1993), it is possible for cancer patients to satisfy criteria for depression solely through somatic complaints while reporting little mood disturbance; adding more to the presence of depression in cancer patients and confirming that the amount of coping is a reflection of the amount of psychological distress.

It is therefore recommended to define a policy to reveal cancer diagnosis to patients looking for better in formational support and problem solving abilities. The importance of early detection of psychiatric symptoms and their handling, offers a better quality of life to cancer patients.

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محددات التكيف فى مرضى الأورام السرطانية المصريين

يهدف هذا العمل إلى دراسة عملية التكيف من حيث الكم والوسائل والاستراتيجيات المختلفة عند مرضى الاورام السرطانية المصريين والبحث عن الاعراض النفسية المصاحبة لمرضى السرطان، تم دراسة اربعين مريضاً بالقسم الداخلى بالمعهد القومى للأورام التابع لجامعة القاهرة يعانون من سرطان الدم أو الغدد الليمفاوية ويتراوح عمرهم بين ١٩ – ٤٥ سنة وطبقت عليهم بجانب الدراسة النفسية المفصلة : ١) قائمة الاعراض المرضية ٢) استبيان الحالات الانفعالية ٣) التعامل مع المرضى ٤) استبيان نوربك للتأييد الاجتماعى.

ودلت النتائج على وجود مساندة اجتماعية خصوصاً العاطفية بنسبة ٩٧,٧٪ وتلقى ثلث المرضى مساندة بالمساعدات العينية وتلقى ١٥٪ تأييداً معلوماتياً ولم يتلق ٥٪ فقط أى مساندة وقد استوفى ٤٢,٥٪ من المرضى مقاييس التقسيم الرابع للامراض النفسية لإضطراب صعوبة التكيف كان التكيف النشط الادراكى أكثر الاستراتيجيات استعمالاً يليه التكيف النشط السلوكى ثم التجنب وقد وجدنا علاقة احصائية قوية بين الثقافة سواء ريفية أو حضرية وبين التكيف الادراكى النشط والتكيف السلوكى النشط وكانت هناك علاقة احصائية قوية طردية بين درجة التعليم وبين التكيف الادراكى والسلوكى النشط وكانت هناك علاقة احصائية قوية بين كمية المعاناة النفسية وكم التكيف ولم نجد من خلال هذا البحث – علاقة احصائية واضحة بين السن والجنس أو الحالة الاجتماعية أو الوظيفية وبين التكيف أو المعاناة النفسية.