# Cancer patients' reluctance to discuss psychological distress with their physicians was not associated with underrecognition of depression by physicians: A preliminary study

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# ABSTRACT

*Objective:* To investigate the association between cancer patients' reluctance for emotional disclosure to their physician and underrecognition of depression by physicians.

*Methods:* Randomly selected ambulatory patients with lung cancer were evaluated by the Hospital Depression and Anxiety Scale (HADS), and those with scores over the validated cutoff value for adjustment disorder or major depressive disorder were included in this analysis. The data set included the responses to the 13-item questionnaire to assess four possible concerns of patients in relation to emotional disclosure to the treating physician ("no perceived need to disclose emotions," "fear of the negative impact of emotional disclosure," "negative attitude toward emotional disclosure," "hesitation to disturb the physician with emotional disclosure"). The attending physicians rated the severity of depression in each patient using 3-point Likert scales (0 [absent] to 2 [clinical]). Depression was considered to be underrecognized when the patients had a HADS score above the cutoff value, but in whom the depression rating by the attending physician was 0.

Results: The HADS score was over the cutoff value in the 60 patients. The mean age was 65.1 + 10.0, and 82% had advanced cancer (Stage IIIb or IV or recurrence). Depression was underrecognized in 44 (73%) patients. None of the four factors related to reluctance for emotional disclosure was associated with the underrecognition of depression by the physicians. None of the demographic or cancer-related variables were associated with depression underrecognition by physicians.

Significance of results: The results did not support the assumption that patients' reluctance for emotional disclosure is associated with the underrecognition of depression by physicians.

KEYWORDS: Oncology, Communication, Psycho-Oncology, Depression, Quality of life

# **INTRODUCTION**

Cancer patients frequently experience psychological distress, especially depression (McDaniel et al., 1995). Because depression interferes with the quality

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of life of the patients, induces a desire for death, increase the usage of health care and burdens on the family. Thus it is important to recognize depression and initiate intensive treatment (Block, 2000).

Appropriate assessment is the key and the first step to better management of depression. However, physicians often underestimate the severity of depressive symptoms in their patients (Passik et al., 1998; Fallowfield et al., 2001), and they are less likely recognize distress in more distressed patients (Merckaert et al., 2008). Emotional communication is an interactive phenomenon and is impacted by provider-, health care system-, and patient-related factors. Some review articles have cited cancer patients' hesitation to share their emotional distress and/or concerns with physicians as being possibly related to the underrecognition of depression in these patients by their physicians (Maguire, 1999). Furthermore, patients who were more anxious or depressed may be less likely to disclose their concerns to nurses (Heaven & Maguire, 1997). However, few studies have actually investigated the influence of such patient factors on underrecognition of depression by medical staffs, partly due to the lack of a suitable method of assessment of patients' attitude toward emotional disclosure.

We previously conceptualized four possible concerns on the part of the patients in relation to emotional disclosure: "hesitation to disturb the physician with emotional disclosure," "no perceived need to disclose emotions," "negative attitude toward emotional disclosure," and "fear of the negative impact of emotional disclosure" (Okuyama et al., 2008). The purpose of this study was to examine whether these concerns were actually associated with the recognition or underrecognition of depression by physicians.

## **METHODS**

## **Subjects**

This is a secondary analysis of data collected for a previously published study in which we conceptualized cancer patients' reluctance to disclose their emotional distress to their physicians (Okuyama et al., 2008). The study subjects were randomly sampled ambulatory patients with lung cancer attending the outpatient clinic of the Respiratory Medicine Division of the Tokai University Hospital, located in a suburban residential area, about 50 km from Tokyo, Japan. The eligibility criteria for patients in the original study were patients who were (a) 18 years of age or older, (b) aware of the cancer diagnosis, (c) well enough to complete the questionnaire and participate in a brief interview, and (d) not suffering from severe mental or cognitive disorders. Patients with a total HADS score above the validated cutoff for adjustment disorder or major depressive disorder (>10) (see Procedures section) were included in this analysis.

This study was approved by the Institutional Review Board and the Ethics Committee of Tokai University, Japan, and was conducted in accordance with the Helsinki Declaration. Written consent was obtained from each patient after full disclosure of the aims and procedures of the study.

## Procedures

Patients were randomly sampled using a planned visiting list and a table of random numbers. After informed consent had been obtained, the patients were asked to complete the self-administered questionnaires described below at home and return them on the next visit day. In the case of inadequate answers, clarifications were sought over the telephone.

## Reluctance for Emotional Disclosure Questionnaire

The Reluctance for Emotional Disclosure Questionnaire (REDQ) was developed for a series of studies to investigate cancer patient-related factors that are barriers to adequate psychological care (Okuyama et al., 2008). The scale assesses four aspects of patients' concerns in relation to emotional disclosure to the attending physician. "No perceived need to disclose emotions" includes four items, including: "No support is needed for my emotional distress, because it resolves spontaneously." "Fear of the negative impact of emotional disclosure" consists of two items, including: "My relation with my doctors will become poor if I discuss my emotional distress with them." "Negative attitude toward emotional disclosure" consists of four items, including: "In general, I do not like to speak about my emotions." "Hesitation to disturb the physician with emotional disclosure" consists of three items, including: "I don't want to bother my doctor by bringing up my emotional distress." Each item is rated on a 5-point Likert scale (1 [not at all] to 5 [strongly agree]). Each subscale score was obtained by calculating the mean score for the items included in the subscale. The validity and reliability of this assessment has been examined in a previous study (Okuyama et al., 2008). In that study, we found that patients with high distress levels were significantly more likely to endorse "Negative impact,' older patients were more likely to report "Negative attitude," whereas male patients were more likely than females to report "Hesitation."

## Depression Rating by Patients

The Hospital Anxiety and Depression Scale (HADS) was used to evaluate the level of depression (Zigmond & Snaith, 1983). This questionnaire consists of a seven-item anxiety subscale and a seven-item depression subscale. It assesses the patients' mental status over the preceding week. We have previously established the reliability and validity of the Japanese version of this questionnaire in cancer patients (Kugaya et al., 1998). The optimal cutoff point for screening of patients with adjustment disorder or major depressive disorder and with major depressive disorder was >10 and >20, respectively (Kugaya et al., 1998).

#### Sociodemographic and Medical Factors

An *ad hoc* self-administered questionnaire was used to obtain information on the sociodemographic status, including marital status, level of education, and employment status. Performance status as defined by the Eastern Cooperative Oncology Group (ECOG) was evaluated by the attending physicians. All other medical information (clinical stage and anti-cancer treatment) was obtained from the patients' charts.

### Depression Rating by the Attending Physicians

An attending physician rated the severity of depression in each patient using a 3-point Likert scale (0 [absent], 1 [present but not interfering with daily life (care not needed)], 2 [present and interfering with daily life (care needed)]) during or just after the patients' visit to the outpatient clinic.

#### Definition of Underrecognition of Depression

Depression was considered to be underrecognized when the patients had a HADS score above the cutoff value for screening of patients with adjustment disorder or major depressive disorder but in whom the depression rating by the attending physician was 0.

### **Statistical Analysis**

The presence or absence of underrecognition was entered into the analyses as the dependent variable. Univariate analyses were carried out to determine the potential correlated factors. Intergroup comparisons of categorical and continuous variables were conducted using the chi-squared test, Fisher's exact test, and the unpaired t test, respectively.

## RESULTS

### **Patient Characteristics**

Data were available for 60 cancer patients (Table 1). The mean age was 65.1 years (*SD*, 10, range, 43-83) and the mean number of days after the diagnosis was 263 (*SD*, 380, range, 24-2,226). Of all the patients, 78% were male, and 82% had advanced cancer (Stage IIIb or IV or recurrence).

# Prevalence of Underrecognition of Depression

Depression was underrecognized by the physicians in 44 (73%) patients (Table 2). There were no significant difference in rate of depression underrecognition by physicians between patients with adjustment disorder level distress and those with major depression level distress ( $\chi^2 = 0.09$ , df = 1, p = .76).

# Factors Correlated with Underrecognition of Depression by the Physicians

Univariate analyses revealed that none of the factors related to the reluctance for emotional disclosure was associated with the underrecognition of depression by the physicians (Table 3). None of the demographic and cancer-related variables were associated with the underrecognition of depression.

# **Table 1.** Demographical and Clinical Characteristics of Patients (N = 60)

Sample characteristic	N	%	
Age (year)			mean: $65.1 \pm 10$ (range, $43-83$ ), median: $65.5$
Sex			
Male	47	78	
Clinical stage			
I-IIIA	11	18	
IIIB	22	37	
IV	26	43	
Recurrent	1	2	
Days after diagnosis			mean: 263 ± 380 (range, 24–2226), median: 140
Performance status			
0	47	78	
1	9	15	
2	4	7	
Anti-cancer treatment	within	a mor	nth
Surgery	0	0	
Chemotherapy	43	72	
Radiation therapy	7	12	

	Depression ra patie			
Depression rating by the attending physicians	Adjustment disorder level (11–19)	Major depression level (≥20)	Total	
Absent Present but not interfering	32 (74%) 11 (26%)	12 (71%) 4 (24%)	44 (73%) 15 (25%)	
with daily life (care not needed) Present and interfering with daily life (care needed)	0 (0%)	1 (6%)	1 (2%)	
Total	43 (100%)	17 (100%)	60 (100%)	

Table 2. Comparison	of Depression Ratings by the
Attending Physicians	and by the Patients

Italics indicate underrecognition of depression by the physicians.

<sup>a</sup>Hospital Anxiety and Depression Scale total score.

## DISCUSSION

The present findings did not support the hypothesis that the reluctance of cancer patients to share their psychological distress with the treating physicians was associated with the underrecognition of depression by the treating physicians.

To the best of our knowledge, this is the first study that examined patients' reluctance for emotional disclosure as a barrier to the recognition of the psychological distress in the patients by the treating physicians in the cancer setting. One of the few studies that focused on this issue in the primary care setting was from New Zealand (Bushnell et al., 2005). They reported that the level of identification of psychological symptoms and psychiatric diagnosis by general practitioners was not associated with the patients' reported unwillingness for emotional disclosure. Although their study was different from ours in many respects, including the patient characteristics, method of assessment of depression and reluctance for emotional disclosure, and the definition of underestimation, taken together, these results may indicate that the reluctance for emotional disclosure may not play a very significant role in the underestimation of depression. One possibility is that other patient factors, for example, nonverbal emotional expression, might influence the physicians' recognition of the patients' psychological status. Presence of families or relatives along with patients during the clinical consultation might be one of other confounding factors, because family members are important proxy to report patients' condition to physicians in Japan. Another important possibility is that the sample size might be too small to find the impact of the reluctance for emotional disclosure on depression recognition by physicians. That could not be avoided because of the nature of the secondary analysis. Also other factors such as provider

Table 3. Factors Correlated with Underrecognition of Depression by the Physicians

Sample characteristics		Underrecognition $(N = 44)$		No underrecognition (N = 16)		
		N	(%)	N	(%)	<i>p</i> value
Sex	Male	34	77	13	81	$0.74^{\mathrm{a}}$
Education	Junior high school or less	15	34	4	25	$0.75^{ m b}$
Marital status	Married	32	73	13	81	$0.74^{ m b}$
Job	Working outside the home	12	27	3	19	$0.74^{ m b}$
ECOG Performance Status	1 or worse	37	84	14	88	$1.00^{\mathrm{b}}$
Living status	Alone	8	18	3	19	$1.00^{\mathrm{b}}$
Disease stage	IIIb, IV, or recurrence	37	84	12	75	$0.46^{ m b}$
Confidants	Presence	42	95	13	81	$0.11^{ m b}$
		Mean	SD	Mean	SD	p
Age		65.4	10.1	64.3	10.1	$0.73^{ m c}$
Reluctance for emotional disclosure	No perceived need	2.1	0.9	2.4	0.8	$0.23^{\rm c}$
	Fear of negative impact	1.5	0.8	1.6	0.9	$0.91^{c}$
	Negative attitude	1.9	0.9	1.8	0.6	$0.42^{\rm c}$
	Hesitation to disturb physicians	2.7	1.0	2.5	0.9	0.51 <sup>c</sup>

<sup>a</sup>Chi-square test. <sup>b</sup>Fisher's exact test. <sup>c</sup>Unpaired *t* test.

factors, system and environmental factors, and interactions between these factors might be play a role in depression recognition. These should be taken into account in future studies.

We acknowledge that the results must be interpreted with caution for several reasons. First, although the questionnaire used to investigate the reluctance for emotional disclosure has been validated, there remains the possibility that the attitudes assessed using the questionnaire in this study might not be concordant with the actual behavior of the patients. Second, depression was not assessed by psychiatric interviews, such as the Structured Clinical Interview for DSM-IV-TR, which is thought to be a gold standard to diagnose depression in patients. Also the definition of underrecognition of depression in the patients was post hoc. Third, only two physicians were included in this study. Fourth, this was conducted in a university hospital and included Japanese outpatients with lung cancer. These facts may limit the generalizability.

This study indicated, consistent with the many previous reports, a high prevalence and frequent underrecognition of depression among cancer patients. Because of these limitations, we should still be cautious in assuming that the reluctance of patients for emotional disclosure may not contribute significantly to underrecognition of depression in clinical practice. To resolve this critical problem, further investigation into this phenomenon and its associated factors and barriers is warranted.

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