

Depression in patients with oral or facial malignancy

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Abstract

Introduction: For many years interest in cancer patients concerned mainly their physical state, treatment efficacy and survival time. Meanwhile, a consequence of oncological treatment is physical and mental disability. Anxiety, fear and uneasiness, being the most common reactions to biological and social threat, can lead to severe mental disorders. The incidence of anxiety and depressive disorders in cancer patients ranges from 20 to 80% in different study centres. Polish scientific literature lacks publications dealing with the mental state of patients treated for facial and oral malignancies. Research attempting to evaluate the way a disfiguring procedure aggravates the patient's mental state is also missing in Polish and foreign academic writing. It is estimated that 20-25% of cancer patients suffer from undiagnosed depression. The aim of the present study was to assess depression level in patients with diagnosed oral and facial malignancy shortly after diagnosis, as well as to pinpoint mental changes caused by extensive surgery.

Material and methods: The study was performed one day before surgery, and then 7 days after it, during the convalescence period on 31 patients in the ward. To measure depression severity the Beck Depression Inventory (BDI) was used.

Results: Symptoms of depression were found in more than 40% of patients before surgery and 58.5% after it.

Conclusions: Surgical treatment of face and neck cancer may increase the level of depression. Patients treated with extensive surgery should be able to obtain professional psychological help both before and after treatment.

Key words: depression, face and neck neoplasm, surgical treatment.

Introduction

Diagnosis of malignancy is commonly perceived as a major threat irrespective of the socioeconomic status of a given society. Oncological treatment results in physical and mental disability [1, 2].

Surgical treatment of face and neck neoplasms cripples the patient visibly and may impair breathing, chewing or swallowing or lead to loss of speech function [3-5]. Functionally and aesthetically unsatisfactory reconstructive procedures limit a patient's social capacity [6]. Nevertheless, effective treatment as understood by an average patient entails full mental and physical recovery [7].

For many years, interest in cancer patients focused solely on their physical health, treatment efficacy and pertinent survival time. Meanwhile, anxiety, fear and uneasiness, being the most common reactions to biological and social threats, lead to severe mental disorders [8, 9].

Malignant disease most often results in maladjustment, depression and anxiety, next in consciousness disturbances and less often in psychorganic and psychotic disturbances [10]. Depression is the most common disorder and is more likely to coexist with a somatic disease. The basic symptoms of depression according to the International Statistical Classification of Diseases and Related Health Problems include mild depression, loss of interest and enjoyment, low energy levels leading to increased tiredness and decreased activity. Other basic symptoms are weakened concentration and attention, low self-esteem and self-worth, feelings of guilt, suicidal thoughts and attempts, sleep disorders and loss of appetite.

Depression may follow diagnosis or deterioration of quality of life after treatment. Depression in the case of diagnosed cancer directly affects the course of disease and treatment [11, 12].

Immunological dysfunctions in patients with depression delay recovery or even make it impossible [13]. Patients with depression are less responsive to treatment and experience more adverse effects than non-depressive patients [14]. The incidence of anxiety and depression in cancer patients ranges from 20 to 80% in various study centres [15, 16].

Research on the topic of facial and oral cancers affecting the patients' mental state is lacking. As far as we know, there have been no attempts to assess the link between a disfiguring procedure and the patient's mental state.

The aim of the present study was to assess depression level in patients with diagnosed oral and facial cancers shortly after diagnosis as well as to pinpoint mental changes triggered by extensive surgical procedure.

Material and methods

The study was conducted in the Department of Maxillofacial Surgery of Wroclaw Medical School and in the Clinical Division of Maxillofacial Surgery of the 4th Military Hospital in Wroclaw among patients having surgical treatment for face and oral cancers.

The study group included 34 patients aged 19 to 74, 9 women and 25 men. The mean age of falling ill was 52.84. The questionnaire results were analyzed for 31 patients, the rest failing to complete the written test. These patients had been diagnosed with a malignancy approximately 20 days earlier and had undergone extensive surgery.

For most patients a large part of the maxilla or mandible bone was removed, and also a sizable part of the tongue soft tissues, the oral floor or palate.

Also bilateral lymphangectomy was performed for most patients. The patients had various degrees of face deformation after the procedure, and sometimes impaired speech and swallowing functions. None of the patients had been treated for depression before the diagnosis of malignancy was made.

The aim of the present paper was to assess the incidence of depression; therefore the social status data of patients have been disregarded.

The study was conducted one day before the surgical procedure and then 7 days after the surgery during the convalescence period in the ward.

The method used was a questionnaire self-report. In order to assess severity of symptoms of depression the Beck Depression Inventory (BDI) was used. The inventory comprises 21 sets of statements describing different emotional states. The patient chooses only one statement in each set, the one that most accurately describes the way they have felt for the past week. There is a scale for each item ranging from 0 to 3 and the correlation between the total score and severity of depression is directly proportional. The scale assessment is as follows: 0-11 no depression, 12-26 mild, 27-40 moderate and 50-63 severe depression.

Results

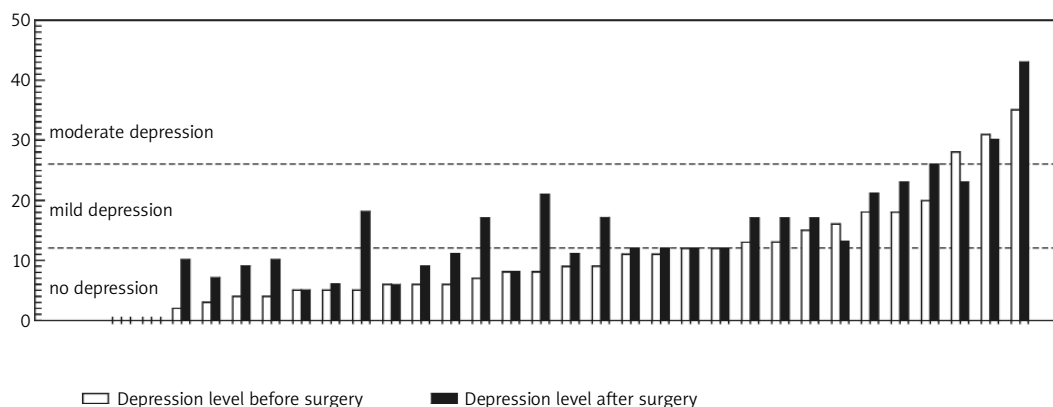
Qualitative analysis of the results was performed, and then the results were characterized using descriptive statistics.

Before surgery mild depression was diagnosed in 10 patients (32%), moderate in 3 (9.7%). On the whole, more than 40% of the patients were diagnosed with depression. Seven days after surgery this percentage rose to 58.5% – 16 patients had mild depression (51.61%) and 2 moderate. After surgery the mental state of patients worsened, which corresponded to a score increase of over 3 points.

For two patients, both prior to and after the procedure, no depressive disorders were found (BDI=0). One of the patients, a 19-year-old man, had been battling against lymphoma for 7 years. A 56-year-old woman had a neoplasm diagnosed by a histopathological examination in a small palate tumour, which had been noticed by the woman 3 weeks earlier. Her postoperative condition was probably due to the fact that the procedure had not impaired her functioning at all. The biggest noted increase was 13 points. For one patient a definite mood improvement was noticed after the procedure (28 points before surgery, 23 after it). For 6 patients their mental status after surgery did not change (5 patients in this group did not have depressive symptoms before and after surgery, for one mild depression persisted).

The mean for the BDI index before surgery was 11,1290 points, the median 9 points. After surgery these values were 14,4516 and 12 points respectively. In both statistics values 3 points higher on average were obtained in the measurement of the depression index after surgery.

In order to check whether BDI values before and after surgery differed significantly, Student's t-test was used to compare the two means in dependent



disorders are an embarrassing issue for Polish patients. An offer of counselling is often rejected for fear of being stigmatized by society. Proper management seems necessary considering the number of patients affected, especially because the risk of suicide in patients with depression is estimated at 25% [19, 20]. Meanwhile, accurately diagnosed depression is a curable disease.

In Poland there are support groups for women after mastectomy, people with stoma and patients after laryngectomy; however, there is no support for patients most affected, whose disability is difficult to hide, i.e. patients treated for facial and oral neoplasms. Significant physical impairment and the resulting mental disorders require special support [3, 5].

Coping with the negative emotions experienced by patients is one of the more decisive factors influencing the course of treatment and recovery.

In conclusions surgical treatment of face and neck cancer results in significant deformation and impairment of speech, swallowing and breathing, which can increase the level of depression after surgery.

Patients with head and neck cancer should be able to obtain professional psychological help both before and after surgery, first to prepare for extensive surgery, then to accept changes and difficulties after it.

High positive codependence between BDI before and after treatment makes it possible to conclude that in patients with symptoms of depression before surgery, these symptoms can be exacerbated after it.

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