

## **Medical students and stigma of depression. Part 2. Self-stigma**

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### **Summary**

Up to 30% of medical students suffer from depression. They have better access to health-care, but still receive appropriate treatment less frequently than people with depression in the general population. Most of them do not seek medical help as depression is perceived as a stigmatizing disorder, which leads to self-stigma and hampers early diagnosis and treatment. Thus, self-stigma means less effective therapy, unfavorable prognosis and relapses. According to the literature, self-stigma results in lowered self-esteem and is a major obstacle in the performance of social roles at work and in personal life. Stigmatization and self-stigma of depression among medical students are also associated with effects in their later professional life: they can lead to long-term consequences in the process of treating their patients in the future. Currently there are no unequivocal research results indicating the most effective ways of reducing stigmatization and self-stigma. It is necessary to educate about the symptoms and treatment of depression and to implement diverse intervention techniques to change behaviors and attitudes as early as possible.

**Key words:** depression, stigmatization, self-stigma

## Depression in medical students

Medical students suffer from depression and other mental disorders more frequently than the general population and their quality of life is lower than that of other peers. The prevalence of depression among medical students is 10–25% [1–5]. In a review of the literature published in the years 1990–2010 Ibrahim et al. [6] found that the prevalence of depression among medical students was in excess of 30%, i.e., much higher than the figure for the general population, estimated in the US at 9% [7]. Also studies conducted among Polish students showed that as many as 21.7% of them had used the help of a psychologist or a psychiatrist, with further 36.5% declaring the wish to remain under psychological care [8]. The incidence of depression depends on applied diagnostic criteria and research tools as well as on the age of the respondents, and more precisely, on a year of study in which the research was conducted. Rosal et al. reported that the prevalence of depression among students beginning their medical studies was similar to the frequency seen in the general population of young people, but the percentage of depression sufferers increases much more in the group of medical students as their education progresses compared to the comparative group [9]. In a study carried out by Mojs et al. [10] first year medical students showed much greater intensity of the symptoms of depression compared with students in their later years. Many factors contribute to the occurrence of depression in students – the vicious circle of stress, fear and mood disorders from the very beginning of medical studies is caused by sleep deprivation, a poor diet, lack of regular physical activity, high own and social expectations as well as insufficient support systems. A review of studies on the mechanisms of depression in students will be presented in a separate paper.

### Stigmatization and self-stigma

Stigmatization means an attitude of social disapproval, negative perception of a specific group of people due to their physical or mental characteristics, lifestyle, system of values or other attributes [11]. Stigmatization of a mentally ill person is a multi-stage process leading to the rejection of the individual, his/her discrimination and exclusion from functioning in various areas of social life [12, 13]. The patient is often also subject to social stigmatization and as a person coming from a stigmatizing society shares the opinions expressed by the majority and succumbs to self-stigma [14]. In the literature, self-stigma is referred to as “the other illness” leading to lower self-esteem and constituting the main obstacle in performing social roles, at work and in personal life [12].

### Self-stigma of medical students

Although, during their studies, medical students receive information on mental disorders and their treatment they often do not consider depression to be an illness

requiring therapy [5]. It would appear that they have better access to healthcare, but despite this they receive the appropriate treatment less often than persons with depression in the general population [15, 16]. This is due to the fact [17] that more than fifty per cent of students with symptoms of depression fear that disclosing their illness may be risky. In this group, over 60% of students thought that seeking help would mean that their own ability to cope with the illness was insufficient. These results indicate that students with depression feel stigmatized by their colleagues and academic teachers, and this stigmatization/self-stigma associated with depression and using psychiatric help may constitute a barrier to seeking treatment [1, 15, 16]. In the group of depression patients among first and second year medical students in as many as 30% stigmatization was an obstacle to seeking professional help. Nearly 40% of students reported the lack of confidentiality as a barrier to starting treatment and 24% spoke of concerns that the information about therapy would be noted in their university documentation [15]. Students also fear that disclosing their depression may adversely affect their medical education or reduce their chances when applying for a residency [1, 15, 16]. Rosenthal and Okie [5] quote statements made by students who do not seek treatment for depression because "as a medical student you should simply deal with it yourself". Only a quarter of medical students with depression receive treatment [1]. In the course of studies on stigmatization and self-stigma of medical students subjects have been asked about various aspects of perceiving patients. In parallel, their symptoms of depression, levels of stress and the burn-out syndrome have been assessed using questionnaires, interviews and surveys.

Schwenk et al. [17] studied all students at the Medical University in Michigan using an online questionnaire regarding symptoms of depression in medical students and their perception of persons with depression. Among 505 respondents, symptoms of moderate to severe depression were observed in 14.3% of them. Compared with students with no symptoms of depression or with mild depression these persons more frequently ticked the answer: "if I had depression other students would respect my opinion less" (56.0% vs. 23.7%); they also feared that faculty members would perceive them as unable to perform their duties. Men, more often than women, thought that students with depression may pose a risk to patients (36.3% vs. 20.1%). First and second year students thought more frequently than third and fourth year students that seeking help in depression would make them feel less intelligent (34.1% vs. 22.9%).

Nieuwsma and Pepper [18] studied convictions regarding the etiology of depression and the perception of stigmatization in depression as well as the possibility to control mood and the efficacy of various methods of treating this disorder. Opinions of students who had previously received treatment for depression were compared with those of students who had never experienced this illness. The results demonstrated that the participants who had once suffered depression thought that this disorder was associated with greater stigmatization compared with the opinions of those who had never had depression. The etiological model considered by them to be the cause of depression was not associated with their perception of stigmatization associated with

depression. However, the causes of depression chosen by students did correlate with the preferred treatment method and the belief in the ability to control mood.

A study conducted by Givens and Tjia [15] aimed at evaluating symptoms of depression using Beck's Depression Inventory, and at identifying barriers to seeking professional help among students suffering from depression. Among 194 students at a Medical University in California depressive symptoms were observed in 24%. Only 22% of them used outpatient psychiatric care. The most frequently reported barriers to seeking help were: lack of time (48%), lack of confidentiality (37%), stigmatization associated with receiving psychiatric treatment (30%), price (28%), as well as fear of unwanted intervention (26%).

An online study by Cheng et al. [19] included 1,010 medical students at four medical universities in Australia. They were asked, among others, about their beliefs regarding depression sufferers and about the feeling of self-stigma (25% of respondents stated that they had suffered from depression in the past). Most students disagreed with statements pertaining to self-stigma, but more than four-fifths shared beliefs stigmatizing depressed patients (including the belief that "depression is not a real medical illness"). A higher level of self-stigma was shown by students (more than one third of the total) presenting a greater degree of stress (according to the scale used in the study). Persons who reported previous history of anxiety disorders showed greater stigmatization of depression sufferers.

Chew-Graham et al. [16] studied the causes of stress and the attitude of medical students towards seeking help in the event of psychiatric disorders. The study was carried out among medical students at Manchester University using partly structured interviews. The study group was representative, selected in respect to sex, ethnic origin and nationality (British citizens and others). Students admitted that studying medicine was very stressful. They also indicated that stigmatization of mental illnesses dominated among students and did not cease with time and was still present later, at work. Avoiding professional help begins early and is associated with the conviction that a mental disorder will be seen as a sign of weakness and will have negative consequences for the professional career.

A study conducted by Wimsatt et al. [20] aimed at early detection of factors causing the feeling of stigma among medical students with depression, as well as at designing programs reducing stigmatization. The study was carried out using a questionnaire assessing symptoms of depression, attitudes towards the mentally ill and potential sources of stigmatization associated with depression. Nearly 15% of students reported having been diagnosed with depression in the past. A majority of respondents indicated that, if depressed, they would feel embarrassed if their friend knew. Many expressed the belief that disclosing depression could adversely affect their career development. The study identified three basic stigma factors: perceiving depression as a personal weakness, fear of disclosing the illness to others and the belief that depression leads to social or professional discrimination. Students linking depression with a personal weakness perceived treatment as less effective and the

academic environment as more competitive. Those who indicated social stigmatization considered treatment and consultations with an expert to be less helpful and they associated depression with the inability to cope. Depression of the respondents was associated, to greatest extent, with the expected stigmatization in the form of social or professional discrimination.

A study conducted at the Yale Medical University [21] aimed at establishing a connection between stress, burn-out, stigmatization, depression and seeking help among medical students. An online survey was carried out among 183 respondents. As many as a quarter of the surveyed students thought that their problems with mental health had increased after commencing their studies, but a majority stated that they felt no discomfort in seeking help in the case of an illness. Those admitting to having a problem with this more frequently showed greater problems with mental health and sought no treatment. Vankar et al. [22] studied the severity of depression and the feeling of stigmatization associated with developing depression among students of medicine at a private medical school in India. The study included 331 students who completed the Patient Health Questionnaire (PHQ-9), as well as a partly structured survey allowing the evaluation of self-stigma, and stigmatization of depression sufferers. In the studied group, 26.6% of students showed symptoms of moderate or severe depression based on the results of the PHQ-9 score. Over 70% of respondents thought that developing depression could negatively affect their education and 52% regarded the illness as a sign of personal weakness. Women more frequently believed that other students would not like to work with a student suffering from depression (50.9% vs. 36.2%), and also that such persons were unable to perform their duties connected with studying medicine. Self-stigma associated with disclosing depression to friends and reluctance to work with someone with depression increased with every year of studies. Similarly, at a Polish university medical students denied the need for seeking specialist care in the event of diagnosing symptoms of depression [23].

A study carried out by Dyrbye et al. [24] at six medical universities pertained to seeking help in depression among medical students suffering from burn-out. The study used a questionnaire assessing the severity of burn-out, symptoms of depression, quality of life, perception of stigmatization, personal experiences, as well as the attitude towards seeking help and treating depression in the event of developing this mental illness. The survey was completed by 873 students, out of which 454 showed symptoms of burn-out. This latter group showed a greater intensity of self-stigma. Respondents who sought help due to burn-out syndrome during 12 months preceding the study indicated twice as often than others that students seeking help were seen in a negative light by their academic teachers. Medical students indicated less often that in the case of a serious emotional problem they would seek professional help (26.9%) than persons from the general American population (44.3%) or age-matched individuals (38.8%). An online survey of Polish medical students has shown that symptoms of burn-out syndrome were much more severe at the beginning and during the last period of their studies [25]; symptoms of depression have not been evaluated in that study. Currently,

studies are being conducted in a number of countries, including Poland [26, 27], using the International Depression Literacy Survey [28] developed by the Brain & Mind Research Institute, translated by us into Polish. This is a scale which gauges both the knowledge about depression (statistics, facts, symptoms), as well as attitudes, awareness and personal experiences. It also measures the level of stress of the respondents (Kessler Psychological Distress Scale – K10) and the severity of psychological and/or somatic symptoms (Somatic and Psychological Health Report – SPHERE) [29].

In the opinion of some authors stigmatizing attitudes of medical students are usually due to anxiety and insufficient knowledge about mental disorders [30]. Studies conducted by Sayarifard et al. [31] concerned mental health literacy, i.e., the knowledge and beliefs regarding mental illnesses, as well as their diagnosis, treatment and prevention. They were conducted at the Tehran Medical University and included 324 students. Questions in the survey concerned diagnosing mental disorders, their prevention, seeking help, stigmatization, as well as the effect of the media coverage. The studies revealed that in the event of falling ill most students would seek help among their friends and acquaintances. The main barrier to seeking help was fear of stigmatization. It is worrying that for medical students television and the Internet are the most frequently indicated sources of information about mental health. In the opinion of Tjia depression affects not only the life of medical students but may also have long-term consequences for the treatment of their patients in the future (as cited in: [5]. Students think that they should hide depression because they are taught that they are healers and not persons who can have problems on their own [5]. It is stressed that medical students are always in a situation of high expectations. They feel that they take decisions which save lives and cannot make a mistake [32]. Subsequently many doctors are not treated for depression because they fear the disclosure of their illness but “if they do not know how to treat their depression then this adversely affects the way in which they treat their patients” [5].

We are not aware of papers dealing with interventions aimed at reducing self-stigma, although it appears that self-stigma as an effect of stigmatization may be reduced following the application of interventions reducing stigma in medical students and physicians. Various stigmatization reduction methods: role-playing, training in first aid in mental illnesses, education (education interventions), sending one-off e-mail messages with information about stigmatization, direct contact with patients, education with elements of direct contact, combination of a lecture and direct contact with patients, combination of a lecture with a recorded contact with patients, direct contact with a sick peer, direct contact with the carer of a sick person, have been described. The object of the analysis was the reduction of stigmatization and the duration of such change. According to the results of a systematic review of the literature regarding the effectiveness of methods reducing stigmatization among healthcare employees and medical students [33] interventions with elements of direct contact with patients, education e-mails, filmed interviews with patients proved to be more effective in reducing stigmatization, while role-playing was not effective. Other methods may be useful,

but regardless of the method, follow-up studies show that the subjects sooner or later return to their previous views. This means that such activities should be repeated in order to sustain the effect. A proposition to introduce online interventions in the form of lectures, films, comments, tools for diagnosing disorders and monitoring the mental state appears interesting [34, 35].

It appears important for medical universities to use measures preventing stigmatization/self-stigma among their depression-suffering students from the beginning of the studies. Although we do not know what the far-off effects of such actions may be, it is worth pointing to solutions already in existence. In the years 2013–2015 reports containing a systematic review of the literature, online surveys, structured telephone interviews with representatives of medical universities and students, as well as guidelines regarding support for medical students showing mental disorders were published in the United Kingdom [36, 37]. This report [36] identified four main issues associated with the provision of support for medical students with depression and other mental illnesses:

1. Precise definition of the role and purpose of appointing a personal tutor;
2. Development of monitoring systems designed to identify/detect persons who may need help;
3. Creation of an atmosphere conducive to developing peer support;
4. Moving towards a model of medical care for students independent of the university – this is based on the assumption that the model of care provided by the university may amplify stigmatization.

The report [37] also listed the following tasks of medical universities relating to helping students with mental disorders:

- (a) Medical schools should create an environment where mental health issues are discussed openly in order to reduce the stigmatization associated with them. Such environment reduces stigmatization and promotes mental health;
- (b) It is very important to help students return to their studies interrupted because of mental problems. A return to a new group of students can be difficult. In addition, students fear stigmatization if their colleagues learn the reason behind their break in studying;
- (c) Medical universities should have a plan for reintegration/return to classes for every student. This plan should be discussed with the concerned student. Work on this plan should begin early, a long time before the student's return, even at the time of taking a break from the studies. Setting out clear expectations helps students and universities conduct the reintegration process;
- (d) Students in co-operation with persons responsible for assistance at medical universities should launch campaigns rising awareness of mental health issues aimed at reducing stigmatization;
- (e) It is necessary to take actions designed to convince students that they should not avoid seeking treatment out of fear of records in their university documentation and negative consequences for their future career;

- (f) It is necessary to separate the function of a person providing support and a person who may take decisions regarding further studies (thus ensuring that students are able to report problems without fear that this will affect their studies).

The report led to the creation of guidelines and recommendations for medical schools [37, 38], presenting the following examples of actions:

- (a) offering help by other students, trained in providing assistance and advice on dealing with stress, since some students may prefer to first approach their peers;
- (b) lectures and courses offered at an early stage of the studies to educate students in mental health and ways of finding help if necessary;
- (c) appropriate training of staff acting as personal tutors so that they know when and where to refer students with mental problems and how to recognize mental disorders;
- (d) providing advice and psychological support to students by the university;
- (e) monitoring the progress made by students in their studies, which allows discussing any potential problems of students whose performance gives rise to concerns at the university.

The program in place at Cardiff University is described as an example of good practices [37, 38]. The program allows students with mental problems to come forward and staff to refer such students. Students are consulted by trained case managers who contact external institutions and help students gain access to medical care, and if necessary also act as their mediators/representatives at the university. At the start of the academic year all students receive written information about the system and access to persons who can help them [38]. At Cardiff University it is stressed that these services cannot operate in isolation without the university's support. This university also runs training courses for the entire personnel aimed at identifying such situations and suggesting help to persons with mental problems. A student asking for help because of mental problems should expect to receive assistance and support and not criticism and should know that asking for help does not mean weakness and that the medical university will provide this help [38].

### **Recapitulation**

As many as 30% of medical students may suffer from depression [6]. Most of them do not use medical help because depression is perceived as a stigmatizing illness which also leads to self-stigma and hampers early diagnosis and start of the treatment. This, in turn, means inferior (suboptimal) treatment, a less favorable prognosis and relapses [34]. The authors of papers on depression and self-stigma agree that it is necessary to create such conditions for medical education where depression among medical students is treated like any other medical problem requiring diagnosing, treatment and prevention. It is also necessary to ensure that students feel comfortable and secure [32, 36–38].



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