

Depression Management in Primary Care in Lithuania and Latvia

Depresijos diagnostika ir gydymas Lietuvos ir Latvijos pirminėje sveikatos priežiūroje

Greta STYRAITE¹, Anete Ance BUKA², Agne SARSKUTE³, Davis VECMUKTANS⁴, Jurate PECELIUNIENE^{1,5}

^{1,3} Vilnius University Faculty of Medicine, Vilnius, Lithuania

^{2,4} University of Latvia Faculty of Medicine, Pauls Stradins Clinical University Hospital, Latvia

⁵ Clinic of Internal Diseases, Family Medicine and Oncology, Vilnius, Lithuania

SUMMARY

Background. Lithuania (LT) and Latvia (LV) have high prevalence of depressive disorder with one of the highest prevalence of suicide in Europe. A critical first step in the provision of treatments for any disorder is its effective recognition. General practitioners (GPs) are usually the first contact of the health care system that are obligated to recognize depression at an early stage in order to manage it within an interdisciplinary team successfully. Primary care providers play a central role in managing depression and concurrent physical comorbidities, and they face challenges in diagnosing and treating the condition. Good mental health care outcomes provided by GPs' are related with GPs' skills in diagnosing and treating depressive disorders. Effective mental health protocols and guidelines are the basis to assure successful depression management in primary care (PC).

The Aim. to review current Lithuanian and Latvian mental health strategies, protocols, guidelines also to evaluate recent literature data on GPs' duties, involvement, self-confidence, skills in recognizing and managing depression in their daily practices.

Materials and methods: literature search and review were conducted by using Lithuanian and Latvian mental health care protocols for PC, guidelines, local and WHO statistical bases and studies on depression recognition, diagnosing, treatment and prevention in PC in both, LT and LV from PubMed and Medline databases.

Results. Lithuanian and Latvian Health Care systems do not provide guidelines addressed for GPs on how to recognize, diagnose and follow-up patients with depression in PC. GPs have only general recommendations. Only treatment recommendations are indicated in both countries, however, steps differ as well as reimbursement levels. Our review suggests that GPs have doubts about their clinical skills and preparedness to recognize and treat depression in both, LT and LV.

Discussion. clinical practice guidelines and recommendations are needed for GPs in order to assure effective recognition, diagnosing and treatment of depression in PC. Further training is needed to improve GPs' skills in mental health management in LT and LV.

Key words: general practitioner; primary care; depression; mental health; Lithuania; Latvia

SANTRAUKA

Įvadas. Lietuvoje (LT) ir Latvijoje (LV) depresijos ir susijusių sutrikimų paplitimas yra aukštas, o pagal savižudybių skaičių šios šalys pirmąją Europoje. Sveikatos priežiūros sistemoje šeimos medicinos gydytojai dažniausiai yra pirmieji su kuriais kontaktuoja pacientai, tai suteikia galimybę atpažinti depresiją ankstyvoje stadijoje ir ją sėkmingai kontroliuoti bendradarbiaujant su tarpdisciplinine komanda. Pirminės sveikatos priežiūros paslaugų teikėjai vaidina pagrindinį vaidmenį gydant depresiją ir gretutines somatines ligas, todėl jie susiduria su iššūkiais diagnozuojant ir gydant tokias būkles. Veiksmingi psichikos sveikatos priežiūros strategijos žingsniai ir gairės itin svarbūs, užtikrinant sėkmingą depresinių sutrikimų kontroliavimą pirminės sveikatos priežiūros grandyje.

Tikslas. apžvelgti LV ir LT esančias psichikos sveikatos priežiūros strategijas, gaires, strateginius žingsnius bei naujausius literatūros duomenis apie šeimos gydytojų pareigas, dalyvavimą, pasitikėjimą savimi ir įgūdžius atpažįstant ir gydant depresiją kasdieninėje praktikoje.

Metodai. literatūros paieška bei apžvalga buvo atlikta naudojantis LT ir LV psichikos sveikatos priežiūros reglamentais, gairėmis, statistinėmis duomenų bazėmis, PSO statistiniais duomenimis, PubMed ir Medline duomenų bazėse esančiais tyrimais apie depresijos atpažinimą, diagnozavimą, gydymą ir prevenciją pirminėje sveikatos priežiūros grandyje Lietuvoje ir Latvijoje.

Rezultatai. LT ir LV sveikatos priežiūros sistemos neturi parengusios depresijos atpažinimo, diagnozavimo, ligos sekimo priežiūros gairių skirtų šeimos gydytojams. Šeimos gydytojams pateiktos tik bendro pobūdžio rekomendacijos. Abiejose šalyse pateiktos panašios depresijos gydymo rekomendacijos, tačiau skiriasi ligos gydymo etapų bei vaistų kompensacijos tvarka. Mūsų apžvalga rodo, kad LT ir LV šeimos gydytojai abejoja savo klinikiniais įgūdžiais ir pasirėmimu atpažinti bei gydyti depresinius sutrikimus.

Diskusija. Šeimos gydytojams yra reikalingos gairės ir rekomendacijos tinkamam depresijos atpažinimui, diagnostikai ir gydymui klinikinėje praktikoje. LT ir LV reikalingi papildomi šeimos gydytojų mokymai, skirti klinikinių įgūdžių lavinimui psichikos sveikatos priežiūros srityje.

Raktiniai žodžiai: šeimos medicinos gydytojas; pirminė sveikatos priežiūra; depresija; psichinė sveikata; Lietuva; Latvija

Corresponding author: Greta Styraite, Vilnius University Faculty of Medicine, M. K. Čiurlionio g. 21/27, Vilnius LT-00135, Lithuania. E-mail: greta.styraite@gmail.com

INTRODUCTION

The importance of depression as an international and major public health problem, and the importance of primary care-based support for the majority of people with depression are now well recognized [1–4]. One decade ago, the World Health Organization (WHO) reported that depression was the leading cause of disability and the fourth leading contributor to the global burden of disease [5]. Recently, the WHO stated that depression is still a leading cause of disability worldwide, and a major contributor to the overall global burden of disease [6]. These numbers are still increasing despite the Prevention and management of depression in PC in Europe as a holistic model of care and interventions – position paper of the European Forum for Primary Care was introduced 10 years ago [5,7]. Depression is expected to become one of the three leading causes of burden of disease by 2030 [8]. Globally, depressive disorders are ranked as the single largest contributor to non-fatal health loss (7,5 % of all years of life disabled, YLD) [6]. Care of patients with chronic diseases like depression is frequently not proactive in PC including with other mental health problems, which must be solved in a very complex manner by GPs' [9]. It is estimated that 10–14% of patients seen in PC clinics at any given time have major depression. Unfortunately, reports also suggest that half of these PC patients will not be recognized as having depression [10]. According to the Ministry of Health of the Republic of Lithuania, one of the main priorities in the public health sector is improvement of mental health [11] as well as by the Ministry of Health of the Republic of Latvia [12]. In order to ensure psychosocial wellbeing of people and more versatile assistance to persons with problems of mental health, the Strategy on Mental Health of Lithuania has been developed [11]. Despite these efforts, leading countries of mood, anxiety disorders and suicidal ideation still remain Baltic states within Europe [13] with poor recognition and management of mental disorders by GPs' in Lithuania [14,15] and Latvia [16,17], and with both states having highest rates of suicide in the world [13]. Consequently, this review seeks to review Lithuanian and Latvian mental health strategies, protocols, guidelines and recent literature on GPs' duties, involvement, self-confidence and skills in recognizing and managing depression in their daily practices.

MENTAL HEALTH PROBLEMS AND DEPRESSION STATISTICS IN LATVIA, LITHUANIA AND OTHER EUROPE COUNTRIES

More than 300 million people over the world were estimated to suffer from depression, equivalent to 4.4% of the world's population in 2017. According to the WHO statistical data in the Europe region there are 40.27 million cases (12%) of depressive disorders (Table 1). Data show higher prevalence in the female population [18]. The burden of depression by the WHO is provided in Table 2 [19].

Studies on mental health problems and depression tendencies, recognition, management in Latvia and Lithuania in PC are scarce. There are only few recent decade studies on depression performed. We found 3 studies from LT [20–22] and 4 studies from LV [17, 23–25] available at PubMed, Medline

Table 1. Prevalence of depressive disorders in Europe [18]

Country	Prevalence of depressive disorders	
	Total cases	% of population
Lithuania	169 685	5.6
Latvia	102 702	4.9
Estonia	75 667	5.9
Poland	1 878 988	5.1
Czech Republic	525 488	5.2
Finland	293 921	5.6
Sweden	446 734	4.9
Norway	227 446	4.7
Denmark	267 213	5.0

databases, dated 2010–2020. According to the Latvian Centre for Disease Prevention and Control (CDPC) the number of patients with mental and behavioral disorders in the Latvian Registry is increasing [26,27]. According to the 2016 Survey of Habits Affecting the Health of the Population of Latvia, 48.4% of the population aged 15–64 have experienced tension, stress and depression in the last month. 6.2% of the population noted that tension, stress and depression are common (5.2% of men and 7.2% of women). 6.6% of the respondents complained of depression in the last month, while 16.3% of them have complained of insomnia [26]. Creating a psycho-friendly, supportive and understanding-based environment in the family, at school, in relationships with friends, in relationships with peers, in society, is reported by Latvian authorities as crucial to promoting psycho-emotional well-being [26].

With regard to the mental health of children and adolescents, school bullying is a common form of violence that has a markedly negative impact on the psyche, related to depressive disorders. The prevalence of bullying in Latvia is high, not only because of the high proportion of 13.6% of pupils who are victims in the 11, 13 and 15 age groups, but also among the 42 countries and regions participating in the International Student Health Behavior Survey. Latvia is ranked in the second place in terms of the number of victims of bullying among pupils aged 11, 13 and 15 [26]. Also one of the main mental health problems adolescents face in Lithuania is school bullying: more than half of all schoolchildren are involved in bullying [28–31].

Depression is often lead by suicide [32–37]. Suicide prevention was the objective of new policy and legislative measures in several countries. This allowed for the creation of a suicide prevention bureau at the State Mental Health Center in LT [2]. One of the important indicators of mental health situation and depressive disorders is suicide in LV also. Comparing the dynamics of suicide rates in Latvia and Lithuania, they are variable, but overall, from 2013 to 2016, there is a slight decrease from 19 per 100,000 in 2013 to 18.2 per 100,000 in 2017 in Latvia [26]. In Lithuania suicide rates have been decreasing also since 2013 and in 2018 suicide rates reached 28 suicides per population of 100,000 which would be 683 in absolute numbers. Unfortunately Lithuania still exceeds the EU average. In fact, statistics show that Lithuania

Table 2. The burden of depression in Europe by the WHO: facts and figures [19]

- Each year, 25% of the population suffer from depression or anxiety.
- Neuropsychiatric disorders account for 19.5% of the burden of disease in the European Region, and 26% in European Union (EU) countries.
- These disorders account for up to 40% of years lived with disability, with depression as the main cause.
- Up to 50% of chronic sick leaves are due to depression/anxiety.
- About 50% of major depressions are untreated.
- The cost of mood disorders and anxiety in the EU is about €170 billion per year.

is topmost country by suicide rate in 2020 (31.9 suicides per 100,000) [38–41]. Moreover, the middle age men population is in the highest risk group [40]. Taken all above into account, GPs should be first to take early interventions to diagnose not only depression but also detect suicide ideations [42].

MENTAL HEALTH STRATEGY IN LITHUANIA AND LATVIA

In 2007, the Lithuanian Government approved a Strategy on Mental Health. According to this strategy, the GP's institution is the key to the successful implementation of mental health policy by integrating public and personal health care efforts to protect and enhance citizens' mental health in Lithuania [43]. One of the goals of this strategy is for general practitioners and community nurses to be consulted by mental health professionals and to be able to provide assistance to the majority of the people seeking help due to mental health problems and disorders. Another goal is to train general practitioners to better recognize mental health problems, especially in recognition, to have better knowledge and motivation to diagnose and treat mental disorders [43] especially in those with comorbidities. It was found that training general practitioners in cognitive-behavioral methods also resulted in a demonstrable reduction of symptoms of depression among people with long-term conditions [44,45]. However, there is a lack of measures by which these steps and tasks would be implemented in the strategy. In 2016, the Government of the Republic of Lithuania presented the report of the Implementation of Strategy on Mental Health 2007–2016, and, according to this report, no changes have occurred in the GP's institution in the mental health area [46].

The most important aspects of mental health improvement in Latvia are focused on prevention of mental illness and suicide, improvement of mental health and well-being, improvement of somatic health, full realization of human resources and potentials, reduction of prejudices and discrimination, availability of specialists, interdisciplinary cooperation [47]. Recently the Ministry of Health of LV has prepared a medium-term policy planning document in LV – Plan “Improvement of Mental Health Care Accession Plan 2019-2020”. The plan has been developed in cooperation with the involved state administration institutions – Latvian Centre for Disease Prevention and Control, National Health Service (NHS), Health Inspectorate (HI) and psychiatric professionals [47].

According to the Latvian National Development Plan 2014–2020, Latvia's sustainable development is based on a

healthy and able-bodied person whose physical, mental and social well-being is one of the essential elements of healthy life. The Public Health Guidelines for 2014-2020, identified a number of issues and challenges related to mental health, including [47]:

- There is a bias in society towards people with mental health problems that hinders their inclusion.
- Suicide mortality rates remain high, especially among men.
- The number of people experiencing stress, tension and depression is rising.
- People with mental health problems do not seek primary health care in a timely manner, resulting
- In the primary diagnosis of mental health problems, which may be delayed [47].

Despite all above listed strategies which are made as general recommendations for mental health care, also challenges, there are no particular steps and tactics, based on evidence – based guidelines and recommendations for GPs to proceed in their daily practices in LV and LT.

THE ROLE OF GP'S IN MENTAL HEALTH PROBLEMS MANAGEMENT IN LITHUANIA AND LATVIA

General practitioner competencies on depression management

Primary mental health services are ensured by the GP's institution: GPs, community nurses and by mental healthcare teams – psychiatrist, psychologists and social workers in Lithuania [48]. Lithuanian General practitioner standards define GP's competence to treat depressive disorders, they are obligated to diagnose and treat mild to moderate depressive disorders in adults [49]. Latvia's general practitioners have addressed more detailed competences in recognition, diagnosing and treating depressive disorders than Lithuanians GPs, namely: management of mild/moderate depressive episode; recurrent depressive disorder – mild to moderate depressive episode; adaptation disorders with depressive response, assessing suicide risk; mild organic (symptomatic) depressive disorders. Also, GPs are addressed to recognize and assess the severity of the mood disorder – depressive episode, recurrent depressive disorder, bipolar affective disorder, comorbid depression with depression, depressive addiction in LV [50].

Depression management by GPs'

Currently, GPs' duties are to treat mild and moderate

depression cases in adult PC patients in Lithuania [49]. GPs prescribe 100% Lithuanian Government reimbursable antidepressants such as serotonin and noradrenaline reuptake inhibitors and selective serotonin reuptake inhibitors (SSRI) only for the moderate depression treatment. If a satisfactory treatment effect is not achieved within 4–8 weeks, the GP may prescribe monotherapy with another SSRI or direct patient to a psychiatrist or pediatric psychiatrist for a consultation [51]. If no clinical improvement is achieved treating mild/moderate depressive episodes within 4 to 8 weeks after administration of the antidepressant, Latvia's GPs have slightly different tactics – they have to send their patients for a psychiatrist consultation [50]. In Lithuania, GPs are very restricted in their ability to prescribe antidepressants, the indications for treatment and prescribing of 100% reimbursable antidepressants are very strict also. There are no medications that GPs can prescribe for a long time without consultation of a psychiatrist: certain antidepressants can be prescribed by GPs, and given for 6 months, when patients have to be consulted by a psychiatrist afterwards. Other antidepressants can be prescribed for 6 months only after patient consultation by a psychiatrist [52]. Details are given in Table 3.

Despite treatment tactics above, there are no evidence-based guidelines and management tools for GPs to follow-up patients with depression in PC in Lithuania.

Similarly, exclusive evidence-based guidelines on primary care population depression recognition, treatment and follow-up are not developed in Latvia for GPs to use, too, despite that the Latvian Association of Psychiatrists in cooperation with Latvian Family Physicians Association has developed clinical

guidelines for the diagnosis and treatment of schizophrenia, depression, and bipolar affective disorder, as well as clinical guidelines for the diagnosis and treatment of behavioral deficits and hyperactivity in the pediatric psychiatry population [50].

There have been several recent changes in reimbursement of depressive disorders treatment in Latvia. Diagnosis with ICD-10 codes of depression F32.1–F32.3 were started to be reimbursed 75% from 29th, April 2019, for those diagnosed by GPs in Latvia. Details are given in Table 4. Reimbursement of ICD-10 diagnosis F33.0–F33.4, F33.8, F33.9, has also been changed from 50% to 75% [53].

Compared to Lithuanian depression treatment schemes for GPs, Latvian treatment schemes slightly differ, despite reimbursement differences discussed above (Table 4).

The challenges of depression management by GPs

Data from the Latvian National Health Service show that in 2016, only 5,132 unique patients with a diagnosis of mood disorders were diagnosed in primary care [23]. In both Latvia and Lithuania there is a significant lack of research on this topic which contributes to the lack of statistics from PC: how often GPs diagnose and what tools they use for diagnosing depression in PC, how often they treat depression and prescribe antidepressants. Only 7 articles were found in PubMed and Medline databases [17, 20–25]. There are some studies on recognition, in which were used the Patient Health Questionnaire-9 (PHQ-9) and its shortened version, the Patient Health Questionnaire-2 (PHQ-2) for diagnosing depression in PC in Latvia [23–25]. According to these studies the PHQ-9 is a reliable and valid instrument to diagnose major depression

Table 3. Antidepressants which are prescribed by GP with 100% reimbursement in LT, based on ICD-10 diagnoses [52]

Antidepressants	Indications ICD-10 diagnose
Prescribed for a period of 6 months by GPs, afterwards the consultation of psychiatrist is mandatory	
Amitriptylinum	F32.1, F33.1
Citalopramum	F32.1, F33.1
Duloxetine	F32.1, F33.1
Fluoxetine	F32.1, F33.1
Mirtazapinum	F32.1, F33.1
Paroxetine	F32.1, F33.1
Sertraline	F32.1, F33.1
Venlafaxine	F32.1, F33.1
Firstly, it is prescribed by a psychiatrist, later prescribed for a period of 6 months by GPs, following repetitive mandatory consultation by psychiatrists afterwards	
Bupropionum	F32.1, F33.1, F31.3 (only in patients with moderate depression)
Escitalopramum	F32.1, F33.1, F31.3 (only in patients with moderate depression)
Fluvoxamine	F32.1, F33.1, F31.3 (only in patients with moderate depression)
Tianeptine	F32.1, F33.1, F31.3 (only in patients with moderate depression)
Agomelatine	F32.1, F33.1
Firstly, it is prescribed by a psychiatrist, followed for a period of 3 months by GPs, after that the consultation of a psychiatrist is mandatory	
Acidum valproicum (Natrium valproatum)	F31.3
Haloperidolum	F32.1, F33.1, F31.3 (only in patients with moderate depression)
Lithii carbonas	F32.1, F33.1, F31.3 (only in patients with moderate depression)

Table 4. Antidepressants which are prescribed by GP with 75% reimbursement in LV, based on ICD-10 diagnoses [53]

Antidepressants	Indications ICD-10 diagnose
First line treatment. Prescribed for a period of 6 months by GPs, afterwards the consultation of psychiatrist is mandatory	
Amitriptylinum	F32.1–F33.4; F33.8, F33.9
Nortriptylinum	F32.1–F33.4; F33.8, F33.9
Fluoxetinum	F32.1–F33.4; F33.8, F33.9
Citalopramum	F32.1–F33.4; F33.8, F33.9
Paroxetinum	F32.1–F33.4; F33.8, F33.9
Escitalopramum	F32.1–F33.4; F33.8, F33.9
Sertralinum	F32.1–F33.4; F33.8, F33.9
Mirtazapinum	F32.1–F33.4; F33.8, F33.9
Second line treatment option by GPs, if first line treatment medication was not effective	
Clomipraminum	F32.1–F33.4; F33.8, F33.9
Venlafaxinum	F32.1–F33.4; F33.8, F33.9
Bupropionum	F32.1–F33.4; F33.8, F33.9
Escitalopramum	F32.1–F33.4; F33.8, F33.9
Fluvoxaminum	F32.1–F33.4; F33.8, F33.9
Tianeptinum	F32.1–F33.4; F33.8, F33.9
Agomelatinum	F32.1–F33.4; F33.8, F33.9
Prescribed by a psychiatrist. For patients if the previous 3 treatment courses were ineffective	
Bupropionum	F32.1–F33.4; F33.8, F33.9
Vortioxetinum	F32.1–F33.4; F33.8, F33.9
Other prescribed medication options by GPs	
Buspironum	F32.1–F33.4; F33.8, F33.9
Chlorprothixenum	F32.1–F33.4; F33.8, F33.9
Flupentixolum	F32.1–F33.4; F33.8, F33.9
Haloperidolum	F32.1–F33.4; F33.8, F33.9
Olanzapinum	F32.1–F33.4; F33.8, F33.9
Quetiapinum	F32.1–F33.4; F33.8, F33.9
Risperidonum	F32.1–F33.4; F33.8, F33.9
Sulpiridum	F32.1– F33.4; F33.8, F33.9
Trihexyphenidylum	F32.1–F33.4; F33.8, F33.9

among Latvians in PC [23,24,25]. However, there are only several studies which used Mini International Neuropsychiatric Interview (MINI) and Hospital Anxiety and Depression Scale (HAD) to recognize depression in PC in Lithuania [20–22]. According to recent data, more than half of the patients visiting the GP have undiagnosed mental disorders with most frequent mental disorders identified as a generalized anxiety disorder and major depressive disorder in Lithuania [20, 54]. Also, major depressive disorder is significantly underdiagnosed by GPs' in Latvia [25]. General practitioners say they feel responsible for the management of their patients' mental health problems, but they do not have enough knowledge, only 8.8% of GPs say they have sufficient knowledge in the mental health area and 86.4% would like to improve their knowledge [55]. In 2016, educational materials on depression, diagnostics and treatment of depression and neurotic disorders, and evaluation

of the effectiveness of therapy in primary care were developed in Latvia to reduce health problems and burden of depressive disorders [56]. Overall, 73% of Latvia GPs believe that their work with patients with a mental health profile should be improved. Just over half think their skills in counseling and educating patients and prescribing are very good (54%) or rather good (55%) [57]. Similarly, data from study by Sinkevicius et al. [58] showed that GPs also do not feel sure about their skills in treating depression in Lithuania. GPs who had additional training in mental health were more confident diagnose and treat depression [58]. Likewise, a very important factor is the stigmatization of depression by general practitioners - in study by Sinkevicius et al. [58], most of the surveyed physicians had misconceptions about depression in LT. We did not find data about GPs' stigmatization related issues to recognize, diagnose and treat depression in LV.

Increasing workload contributes to poor recognition and management of mental disorders in PC [5]. Researchers conducted in Lithuania had shown that patients with mental and behavioral disorders increased the workload of GPs' and visited GPs much more frequently [54, 59]. Patients with symptoms of depression posed a higher workload for GPs than patients without symptoms of depression [59]. This just confirms the level of the burden towards GPs practices [54]. This leads to a vicious cycle: Lithuanian general practitioners feel hopeless, depressed and burned out [60]. Latvian burnout data also shows high emotional exhaustion towards GPs' [61]. This fact is thought to be still underestimated by authorities.

There have been proposed measures which can improve mental disorders diagnostics by GPs' in Lithuania:

- mental health knowledge improvement;
- development of clear clinical guidelines for the management of mental disorders;
- improved possibilities for GPs to prescribe psychotropic drugs;
- financial incentives [55].

DISCUSSION

Mental health problems and depression are getting more relevant in modern society with dramatic rising in primary care [62,63]. Knowing that PC services have a key role in provision of mental health, especially for patients with mild to moderate mental disorders, particularly with depression or major depressive disorder as one of the most common and under-recognized mental illnesses in PC [5,13,14,16,20,63–65]. Depression often goes undetected in PC because it co-occurs with many chronic physical conditions and can be comorbid with various somatic disorders [22,66], that is why clear agreement and guidelines on depression recognition, screening and diagnosing tactics are needed for PC specialists to follow. GPs in LV and LT indicate that some of them are lacking education and training which could affect the diagnosis of depressive disorder in PC [67]. This shows a significant weakness of PC systems – some researchers show that better training leads GPs to better practice [67,68]. Additional aspects that can influence the diagnosis are the time limitation per consultation and heavy workload [5,67]. Besides mentioned

problems, what makes the situation even more complicated is the stigma surrounding depression. We did not aim to analyze stigmatization of depression in PC, but it is already clear that more research should be done to evaluate the impact of depression stigmatization in Lithuanian and Latvian GPs' regular practices. Data show that stigma creates barriers for people who are suffering from depression and seeking medical help, and Lithuania has high multiple-discrimination against persons with depression [66]. Data show that these problems are found not only in Lithuania and Latvia but more globally as well [69].

As it is mentioned above, there are no clear recommendations how to screen and diagnose depression in PC, but also how to manage in secondary, and tertiary prevention strategies, especially in comorbid suicide cases, in both countries. Clear tactics, starting early screening, interventions for timely made diagnosis in PC is needed.

There are some differences between Lithuania and Latvia depression treatment in PC. Lithuanians GPs prescribe 100 % reimbursement antidepressants for F32.1, F33.1, F31.3 (only in patients with moderate depression) diagnosis [52] and Latvians' GPs prescribe 75 % reimbursement antidepressants for F32.1–F33.4; F33.8, F33.9 diagnosis [53]. If a satisfactory treatment effect is not achieved within 4–8 weeks, the GP may prescribe another SSRI or direct patient to a psychiatrist in Lithuania [51]. Latvia's GPs have to address their patients

for a psychiatrist consultation [50]. However, there are more similarities in depression management in PC between these countries. Once treatment is successful, secondary and tertiary prevention steps need to be provided for GPs to follow.

Based on GPs' self-reported low level of recognition, diagnosing and management skills, periodical training must be implemented in GPs qualification training yearly in order to start changing depression and related conditions management in PC in both, LT and LV. Certainly, there are more countries specific factors (availability of GPs, numbers of PC centers per 1000 inhabitants) and some other factors that may play a role in recognition and management of depression in PC [70]. We have not analyzed those and other country-specific factors in our review and it is a limitation of the study. In low-income countries, the rate of mental health workers can be as low as 2 per 100 000 population, compared with more than 70 in high-income countries [71]. Despite that both Lithuania and Latvia qualify as high income countries, according to the World Bank data [72,73], depression management remains poor in PC, what also needs to be better investigated as possible, related reason towards depression management in PC in both countries.

DECLARATION OF INTEREST

All authors declare no conflict of interest.

REFERENCES

- McLaughlin KA. The Public Health Impact of Major Depression: A Call for Interdisciplinary Prevention Efforts. *Prev Sci.* 2011 Dec;12(4):361–71.
- Alemdia JM, Mateus P, Frasquilho D, Parkkonen J. EU compass for action on mental health and wellbeing [Internet]. Brussels. 2016 [cited 2020 Apr 9]. Available from: https://ec.europa.eu/health/sites/health/files/mental_health/docs/2016_compassreport_en.pdf
- Ferenchick EK, Ramanuj P, Pincus HA. Depression in primary care: part 1—screening and diagnosis. *BMJ.* 2019 Apr 8;1794.
- Jha MK, Grannemann BD, Trombello JM, Clark EW, Eidelman SL, Lawson T, et al. A Structured Approach to Detecting and Treating Depression in Primary Care: VitalSign6 Project. *Ann Fam Med.* 2019 Jul;17(4):326–35.
- Ma MM. Prevention and management of depression in primary care in Europe: a holistic model of care and interventions – position paper of the European Forum for Primary Care. :10.
- James SL, Abate D, Abate KH, Abay SM, Abbafati C, Abbasi N, et al. Global, regional, and national incidence, prevalence, and years lived with disability for 354 diseases and injuries for 195 countries and territories, 1990–2017: a systematic analysis for the Global Burden of Disease Study 2017. *The Lancet.* 2018 Nov;392(10159):1789–858.
- Craven MA, Bland R. Depression in Primary Care: Current and Future Challenges. *Can J Psychiatry.* 2013 Aug;58(8):442–8.
- Mathers CD, Loncar D. Projections of Global Mortality and Burden of Disease from 2002 to 2030. Samet J, editor. *PLoS Med.* 2006 Nov 28;3(11):e442.
- Archer J, Bower P, Gilbody S, Lovell K, Richards D, Gask L, et al. Collaborative care for depression and anxiety problems. *Cochrane Common Mental Disorders Group, editor. Cochrane Database Syst Rev [Internet].* 2012 Oct 17 [cited 2020 Apr 9]; Available from: <http://doi.wiley.com/10.1002/14651858.CD006525.pub2>
- Kahalnik F, Sanchez K, Faria A, Grannemann B, Jha M, Tovian C, et al. Improving the identification and treatment of depression in low-income primary care clinics: a qualitative study of providers in the VitalSign6 program. *Int J Qual Health Care.* 2019 Feb 1;31(1):57–63.
- Ministry of Health of the Republic of Lithuania. Public Health [Internet]. 2018 [cited 2020 Apr 9]. Available from: <https://sam.lrv.lt/en/health-care/public-health>
- Ministry of Health of the Republic of Latvia. Health Information. 2006 [cited 2020 Apr 9]. Available from: https://ec.europa.eu/health/archive/ph_determinants/life_style/mental/green_paper/mental_gp_co014.pdf
- World Health Organization. Suicide rates, Age-standardized, Data by Country. Geneva: World Health Organization. 2017 [cited 2020 Apr 9]. Available from: <https://web.archive.org/web/20180117045516/http://apps.who.int/gho/data/node.main.MHSUICIDEASDR?lang=en>
- Lithuania: Country Health Profile 2017. State of Health in the EU. Organization for Economic Co-Operation and Development and European Observatory on Health Systems and Policies. Paris: OECD / Brussels: European Observatory on Health Systems and Policies, 2017
- Peceliuniene J. Mood, anxiety disorders and suicidal ideation in primary care patients [dissertation]. Kaunas: Lithuanian University of Health Sciences; 2011
- Latvia: Country Health Profile 2017. State of Health in the EU. Organization for Economic Co-Operation and Development and European Observatory on Health Systems and Policies. Paris: OECD / Brussels: European Observatory on Health Systems and Policies, 2017
- Lefš MS, Vrublevska J, Lūse A, Rancāns E. Latvian family physicians' experience diagnosing depression in somatically presenting depression patients: A qualitative study. *Eur J Gen Pract.* 2017 Oct 2;23(1):91–7.
- World Health Organization. Depression and Other Common Mental Disorders: Global Health Estimates [Internet]. Geneva: World Health Organization. 2017 [cited 2020 Apr 9]. Available from: <https://apps.who.int/iris/bitstream/handle/10665/254610/WHO-MSD-MER-2017.2-eng.pdf>
- World Health Organization. Depression in Europe: facts and figures [Internet]. Geneva: World Health Organization. 2020 [cited 2020 Apr 9]. Available from: <http://www.euro.who.int/en/health-topics/noncommunicable-diseases/mental-health/news/news/2012/10/depression-in-europe/depression-in-europe-facts-and-figures>
- Bunevičius R, Liaugaudaitė V, Peceliuniene J, Raskauskiene N, Bunevičius A, Mickuviene N. Factors affecting the presence of depression, anxiety disorders, and suicidal ideation in patients attending primary health care service in Lithuania. *Scand J Prim Health Care.* 2014 Mar;32(1):24–9.
- Kavalnienė R, Deksnyte A, Kasiulevičius V, Šapoka V, Aranauskas R, Aranauskas L. Patient satisfaction with primary healthcare services: are there any links with patients' symptoms of anxiety and depression? *BMC Fam Pract.* 2018 Dec;19(1):90.
- Butnoriene J, Steibliene V, Saudargiene A, Bunevičius A. Does presence of metabolic syndrome impact anxiety and depressive disorder screening results in middle aged and elderly individuals? A population based study. *BMC Psychiatry.* 2018 Dec;18(1):5.
- Rancans E, Trapencieris M, Ivanovs R, Vrublevska J. Validity of the PHQ-9 and PHQ-2 to screen for depression in nationwide primary care population in Latvia. *Ann Gen Psychiatry.* 2018 Dec;17(1):33.
- Vrublevska J, Trapencieris M, Rancans E. Adaptation and validation of the Patient Health Questionnaire-9 to evaluate major depression in a primary care sample in Latvia. *Nord J Psychiatry.* 2018 Feb 17;72(2):112–8.
- Rancans E, Vrublevska J, Kivite-Urtane A, Ivanovs R, Ziedonis D. Prevalence of major depression and associated correlates in Latvian primary care population: results from the National Research Program BIOMEDICINE 2014–2017. *Nord J Psychiatry.* 2020 Jan 2;74(1):60–8.
- Centre for Disease Prevention and Control. Summary of mental health, 2017 [Internet]. 2017 [cited 2020 Apr 9]. Available from: https://spkc.gov.lv/upload/Psihiska_veselibas_faili/tz_pvl_2016_final.pdf
- Centre for Disease Prevention and Control. Summary of mental health, 2018 [Internet]. 2018 [cited 2020 Apr 9]. Available from: <https://spkc.gov.lv/lv/statistika-un-petijumi/statistika/veselibas-aprupes-statistika1>
- Zaborskis A, Zemaitiene N, Grabauskas VJ, Puras D, Povilaitis R. Lithuania: youth mental health – from research to policies, practice and partnerships. 1994;13.

29. Puras D. Mental health in Lithuania. *Int Psychiatry*. 2005 Oct;2(10):12–4.
30. NGO Save the Children. Pilot Project “Safe School” [Internet]. 2011 [cited 2020 Apr 9]. Available from: https://www.gelbekitvaikus.lt/sites/gelbekitvaikus.lt/files/Pilotinis-projektas_ENG.pdf
31. Geraltauskaite G. Bullying problem in Lithuania [Internet]. 2018 [cited 2020 Apr 9]. Available from: <http://mct.si/sl/bullying-problem-in-lithuania/2018/>
32. Henriksson M, Aro M. Mental Disorders and Comorbidity in Suicide. *Am J Psychiatry*. 1993;6.
33. Veisani Y, Mohamadian F, Delpishah A. Prevalence and comorbidity of common mental disorders and associations with suicidal ideation in the adult population. *Epidemiol Health*. 2017 Jul 22;39:e2017031.
34. Nock MK, Hwang I, Sampson NA, Kessler RC. Mental disorders, comorbidity and suicidal behavior: Results from the National Comorbidity Survey Replication. *Mol Psychiatry*. 2010 Aug;15(8):868–76.
35. Perez J, Beale E, Overholser J, Athey A, Stockmeier C. Depression and alcohol use disorders as precursors to death by suicide. *Death Stud*. 2020 Apr 2;1–9.
36. Pegg S, Dickey L, Green H, Kujawa A. Differentiating clinically depressed adolescents with and without active suicidality: An examination of neurophysiological and self-report measures of reward responsiveness. *Depress Anxiety* [Internet]. 2020 Apr 5 [cited 2020 Apr 9]; Available from: <http://doi.wiley.com/10.1002/da.23012>
37. Indu PS, Anilkumar TV, Pisharody R, Russell PSS, Raju D, Sarma PS, et al. Prevalence of depression and past suicide attempt in primary care. *Asian J Psychiatry*. 2017 Jun;27:48–52.
38. Gailienė D. Suicide in Lithuania During the Years of 1990 to 2002. *Arch Suicide Res*. 2004 Oct;8(4):389–95.
39. Kalediene R, Starkuviene S, Petrauskiene J. Mortality from external causes in Lithuania: looking for critical points in time and place. *Scand J Public Health*. 2004 Oct;32(5):374–80.
40. World Health Organization Mortality Database. Lithuania: Suicide rates [Internet]. Geneva: World Health Organization Mortality Database. 2017 [cited 2020 Apr 9]. Available from: <https://apps.who.int/healthinfo/statistics/mortality/whodpms/>
41. Starkuviene S, Kalediene R, Petrauskiene J. Epidemic of suicide by hanging in Lithuania: Does socio-demographic status matter? *Public Health*. 2006 Aug;120(8):769–75.
42. Ferrari AJ, Norman RE, Freedman G, Baxter AJ, Pirkis JE, Harris MG, et al. The Burden Attributable to Mental and Substance Use Disorders as Risk Factors for Suicide: Findings from the Global Burden of Disease Study 2010. *Baune BT, editor. PLoS ONE*. 2014 Apr 2;9(4):e91936.
43. Parliament of Lithuanian Republic. Resolution of the approval of mental health strategy [Internet]. 2007 [cited 2020 Apr 9]. Available from: <https://e-seimas.lrs.lt/portal/legalAct/lt/TAD/TAIS.295147?jfwid=fhhu5mo1q>
44. Corbière M, Shen J, Rouleau M, Dewa CS. A systematic review of preventive interventions regarding mental health issues in organizations. *Work*. 2009;33(1):81–116.
45. Henderson M, Harvey S, Øverland S, Mykletun A, Hotopf M. Work and common psychiatric disorders. *J R Soc Med*. 2011 May;104(5):198–207.
46. Government of Lithuanian Republic. Mental health strategy report 2007-2016 [Internet]. 2017 [cited 2020 Apr 9]. Available from: <https://e-seimas.lrs.lt/portal/legalAct/lt/TAD/fe4657c17b5c1e7ae747e4b63286?jfwid=umo1q6got>
47. Ministry of Health. Public health guidelines 2014-2020 [Internet]. 2018 [cited 2020 Apr 9]. Available from: <http://polsis.mk.gov.lv/documents/6128>
48. The Decree of the Ministry of Health of the Republic of Lithuania. Description of the procedure for provision of primary outpatient mental health care services [Internet]. 2020 [cited 2020 Apr 9]. Available from: <https://e-seimas.lrs.lt/portal/legalAct/lt/TAD/TAIS.433323/asr>
49. The Decree of the Minister of Health of the Republic of Lithuania. Lithuanian medical norm MN 14-2019 Family physician [Internet]. 2019 [cited 2020 Apr 9]. Available from: <https://e-seimas.lrs.lt/portal/legalAct/lt/TAD/TAIS.268928/fAwkLeXftC>
50. The Latvian Association of Psychiatrists. Guidelines for the diagnosis and treatment of depression [Internet]. 2015 [cited 2020 Apr 9]. Available from: https://www.rsu.lv/sites/default/files/imce/Dokumentu/pnk/LPA_Depresijas_vadlinijas_2015.pdf
51. The Decree of the Minister of Health of the Republic of Lithuania. Description of procedures of ambulatory treatment of depression and mood disorders with reimbursable medications [Internet]. [cited 2020 Apr 9]. Available from: <https://e-seimas.lrs.lt/portal/legalAct/lt/TAD/TAIS.432486?jfwid=rivvwzvpvg>
52. The Decree of the Minister of Health of the Republic of Lithuania. List of diseases you can treat in reimbursable medications [Internet]. 2020 [cited 2020 Apr 9]. Available from: <https://e-seimas.lrs.lt/portal/legalAct/lt/TAD/TAIS.94805/iwlepzLNDj>
53. The National Health Service. Reimburse medication list for depression in Latvia [Internet]. 2020 [cited 2020 Apr 9]. Available from: <http://www.vmnvd.gov.lv/kompensējamiem-likumiem/kompensējamo-zalu-saraksti>
54. Liaugaudaitė V, Pečiulienė J, Raskauskienė N, Mickuviene N, Bunevičius R. Psichikos sutrikimų poveikis pirminei sveikatos priežiūrai. 2018;20(2):5.
55. Jaruseviciene L, Sauliune S, Jarusevicius G, Lazarus JV. Preparedness of Lithuanian general practitioners to provide mental healthcare services: a cross-sectional survey. *Int J Ment Health Syst*. 2014 Dec;8(1):11.
56. Rancāns E., VPP 2014-2017 programmas Biomedicine projekta „Nozīmīgāko psihisko slimību un kognitīvās disfunkcijas radīto veselības problēmu izpēti un sloga samazināšana” [Internet]. 2017 [cited 2020 Apr 9]. Available from: https://www.stradini.lv/sites/default/files/editor/VPP_atsk_seminars_8_bloks07062017.pdf
57. Sņikere S, Trapencieris M, Koroļeva I. Ģimenes ārsts zināšanas un viedoklis par depresijas diagnosticēšanu un ārstēšanu iespējām. :1.
58. Sinkevičius K. Šeimos gydytojų požiūris į depresiją, gebėjimas ją diagnozuoti ir gydyti [master's thesis]. Kaunas: Lithuanian University of Health Sciences; 2018
59. Urbonavičiūtė E, Duonėlienė I, Bunevičius R. Association between the symptoms of depression of ambulatory patients and the workload of primary health care centre. *Biol Psychiatr Psichofarmakol*. 2011 Aug;13(2):63-67
60. Žukauskaitė I, Šarskutė A, Styraitė G, Pečiulienė J. Pilot study of burnout, depression and anxiety of GPs: work-place antecedents and consequences // *European psychiatry*. Paris : Elsevier. ISSN 0924-9338. eISSN 1778-3585. 2019, vol. 56, suppl. 1, p. S207-S208.
61. Avota M, Millere A. Izdegšanas sindroms praktizējošiem ārstiem Latvijā. 2015;8.
62. Hidaka BH. Depression as a disease of modernity: Explanations for increasing prevalence. *J Affect Disord*. 2012 Nov;140(3):205–14.
63. Trautman S, Beesdo-Baum K. The Treatment of Depression in Primary Care. *Dtsch Aerzteblatt Online* [Internet]. 2017 Oct 27 [cited 2020 Apr 9]; Available from: <https://www.aerzteblatt.de/10.3238/arztebl.2017.0721>
64. Sirutytė G, Radzevičienė-Jurgutė R, Martinkėnas A, Jurgutis A. Klaiptėdos miesto šeimos gydytojų pacientų depresijos ir nerimo paplitimas. *Visuom Sveik*. 2014 Jul;6(1)
65. Fleury M-J, Imboua A, Aubé D, Farand L, Lambert Y. General practitioners' management of mental disorders: A rewarding practice with considerable obstacles. *BMC Fam Pract*. 2012 Dec;13(1):19.
66. Alvarez-Galvez J, Rojas-García A. Measuring the impact of multiple discrimination on depression in Europe. *BMC Public Health*. 2019 Dec;19(1):435.
67. Aznar-Lou I, Iglesias-González M, Rubio-Valera M, Peñarrubia-Maria MT, Mendive JM, Murrugarra-Centurión AG, et al. Diagnostic accuracy and treatment approach to depression in primary care: predictive factors. *Fam Pract*. 2019 Jan 25;36(1):3–11.
68. Coppens E, Van Audenhove C, Gusmão R, Purebl G, Székely A, Maxwell M, et al. Effectiveness of General Practitioner training to improve suicide awareness and knowledge and skills towards depression. *J Affect Disord*. 2018 Feb;227:17–23.
69. Hock RS, Or F, Kolappa K, Burkey MD, Surkan PJ, Eaton WW. A new resolution for global mental health. *The Lancet*. 2012 Apr;379(9824):1367–8.
70. Shi L. The Impact of Primary Care: A Focused Review. *Scientifica*. 2012;2012:1–22.
71. World Health Organization. Mental health: massive scale-up of resources needed if global targets are to be met [Internet]. 2017 [cited 2020 Apr 11]. Available from: https://www.who.int/mental_health/evidence/atlas/atlas_2017_web_note/en/
72. The World Bank. Data for Lithuania, High income [Internet]. 2019 [cited 2020 Apr 11]. Available from: <https://data.worldbank.org/?locations=LT-XD>
73. The World Bank. Data for Latvia, High income [Internet]. 2019 [cited 2020 Apr 11]. Available from: <https://data.worldbank.org/?locations=LV-XD>

Received 20 April 2020, accepted 17 May 2020
Straipsnis gautas 2020-04-20, priimtas 2020-05-17