

NEW

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PREFACE

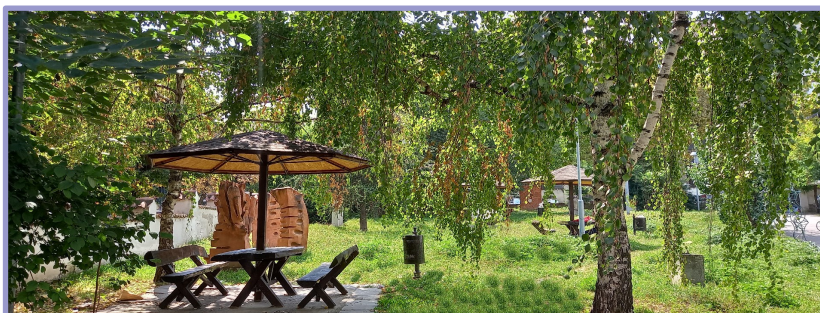
Reflecting on the scientific contributions of the Institute of mental health in 2021

Institute of mental health is host to more than 15-20 different research projects annually. Information about current studies can be found on the Institute webpage (<https://imh.org.rs/page.php?id=56> / <https://imh.org.rs/pageen.php?id=56>). This page also has instructions for submitting research, good clinical practice guidelines, guidelines for evaluating scientific publication and other useful information.

Over the course of 2021, fifteen various subjects were explored by Institute researchers or in collaboration with the Institute, as well as around a dozen different topics that were previously accepted and continued into 2021. At the same time, several publications and datasets that have been made within the organization of the Institute were published in international citation base Journal Citation Report (JCR).

An article by Jelena Vasic et al. (*Frontiers of Psychiatry, 2021*) i was overseen by Prof. Milica Pejovic-Milovancevic and was presented in the first Bulletin edition.

Another article on the JCR list from the previous year was published by assistant Dr. Milica Vezmar and Dr. Olga Colovic in collaboration with other researchers. The authors showed the results of the research in *International Journal of Social Psychiatry* (2021) where they included over 330 patients visiting the Department for psychotherapy at the Institute by analyzing sociodemographic characteristics of patients. The gathered data brought to light new information, which is particularly important for the Balkans, where these data are lacking. This study could stimulate other researchers to research this topic in order to gain valuable insight.



The third article on the JCR list in 2021 was published by Institute researchers Prof. Nadja Maric, Prof. Milica Pejovic-Milovancevic, Assoc. Prof. Cedo Miljevic and other researchers from the Institute by analyzing an outpatient sample gathered during the first few months of the COVID-19 pandemic, right before quarantine was lifted in Serbia. The results were based on the analyses of variables such as diagnosis, personality, stress, distress and quality of life and were published in *Medicine (2021)*. Data published in this article shed light on the characteristics of a population that contacted mental health services at the Institute for the first time at a specific moment of a public health crisis and show us that personality characteristics during COVID-19 influence quality of life more so than diagnosis and similar variables.

These articles published in 2021 have data that was approved and collected over the past few years. In the meanwhile, multiple research groups formed new databases and we are expecting more articles and publications in 2022. This Bulletin serves to present the publications being worked on at the Institute to the scientific and expert public on a regular basis.

On behalf of the editorial board,

Prof. Nađa P. Marić, MD, PhD, FRP

OUR RESEARCH

Shaping future doctor's minds: effects of biological and social models on medical students' views on depression

In the August 2021 issue of the “*Academic psychiatry*” journal clinical teaching assistant Milutin Kostic, MD, PhD, from the Institute of Mental Health and associates published their original research article entitled “[Shaping future doctors' minds: Effects of biological and social models on medical students' views on depression](#)”.



The authors emphasize that over the last several decades the biological (medical) model of depression has been predominant both in future doctor's education and in lay people's views. In their opinion, one of the main causes relates to the view that considering depression as any other physical illness can reduce stigma surrounding the condition, whereby such an approach might encourage more people to seek help and improve. Recent findings have shown that situation is much more complex. In the last three decades there has been a significant rise in antidepressant prescription, and stigma has not been reduced and may have even worsened. Since the aforementioned biological model did not lead to a better understanding of depressive disorder, improved prognosis nor reduction of the patients' stigmatization, the authors believe that it is necessary to revise its dominance in the education of medical students.

The aim of the presented research was to explore how changes in biologically based narratives versus socially focused ones affect medical students' perceptions of causes, treatment strategies and attitudes towards patients with depressive disorder, as well as their beliefs that the patients' condition can improve. The sample consisted of 1652 students from the Faculty of Medicine at the University of Belgrade aged 18 to 32 years who were randomly assigned one out of three text passages describing a female with typical symptoms of depression. Within the text, additional information about different circumstances were also included – in the first version information about certain personal problems of person with depressive disorder, in the second version information regarding the family history of psychiatric disorders, and both information were included in the third version of the text.

The results have shown that although family history of psychiatric disorders does not necessarily imply heredity, the group of medical students assigned with the version of text describing depressive disorder with additional information about family history of mental disorders assumed a biological cause of depression to be more probable (a chemical disbalance, a brain neurotransmission disorder or a genetic predisposition for mental illness) in comparison with the other two groups of respondents, which is also often a prejudice present in the general population. As far as recom-

mended treatments were considered, the aforementioned group of students were more likely to consider prescribing psychopharmaceuticals as a method of choice in the treatment. On the other hand, the group of students assigned with the version of text exclusively describing patient's personal problems were more convinced of the cause being social in nature. The authors also noticed changes in views towards treatment strategies from the first year to later years, with the medical model becoming more dominant over time.

What are the implications for future doctors' education? Even though it has been more than 40 years since the introduction of the biopsychosocial model, in the presence of the indicators of biological causes of psychiatric disorders psychiatrist still tend to think less about social factors and more about medication prescription. The authors conclude that the way we teach medical students and what we focus on in their education shapes their understanding of psychiatric disorders and influences the type of treatment they choose, therefore, the approach should be comprehensive, evidence-based and focused on patients' wellbeing.



More information and schedule on the following [link](#).

GUEST OF THE BULLETIN

Dr Jelena Stojanov, PhD student at the Faculty of Medicine, University of Niš



Dr. Jelena Stojanov is a psychiatrist working at the Psychiatric Hospital „Gornja Toponica“ in Niš. Her PhD is entitled “Frequency and risk factor analysis for clinical characteristics, course, outcome and consequences of postpartum depression” and was mentored by Professor Olivera Žikić. She plans to defend her thesis during 2022.

They filled out a set of standardized questionnaires during their psychiatric evaluation (Edinburgh Postpartum Depression Scale (EPDS), Toronto Alexithymia Scale (TAS-20), Beck Anxiety Inventory (BAI), Holms-Rahe Life Event Scale, Mood Disorder Questionnaire (MDQ) and Prodromal Questionnaire (PQ-16), as well as sociodemographic and relationship/marriage questionnaire. We also gathered data from relevant medical documentation regarding gynecological and obstetric, as well as pediatric variables at four points: second half of third trimester (after 32 gestation weeks), fourth week, sixth month and a year after childbirth.

Why postpartum psychopathology?

Women in this period are particularly psychologically vulnerable, and typically do not receive enough protection due to traditional preconceptions that this period represent unlimited joy for each woman. Mental health of women in this period is important because it can also affect their offspring, relationship with their partner and can impact family systems and the society. Prevention of postpartum mental disorders through screening of potentially important risk factors can significantly reduce the rates of family morbidity and can significantly impact the psychological process of mother-child bonding, which is crucial for adequate psychological development of every human being. This is why prevention and recognition of postpartum mental disorders was the focus of my research.

What is the main research question of your PhD?

The main aim was evaluation of frequency of postpartum depression in our country, as well as determining risk factors for the development of postpartum depression, as well as factors linked with clinical expression of this disorder, its course and consequences on psychomotor development of children.

How was the cohort formed, what was the design of your study?

Our prospective research included so far more than 200 pregnant women/mothers (starting from the second half of third trimester up to a year after birth) who were 18-45 years old and had no previously diagnosed psychiatric, hormonal, inflammatory or autoimmune disorders.

What were the main research findings?

Considering that the research and statistical analyses are currently being done, we can only talk about preliminary results. In the postpartum period, 14.8% subjects scored over 10 on EPDS, 23.15% had alexithymia, while 31.32% had probable alexithymia on TAS. Scores of over 10 on EPDS in the postpartum period were detected in older, unemployed women without partners, those with financial difficulties, and was also statistically linked with detected alexithymia, social isolations, lack of social support of family and more severe anxiety. Postpartum scores of over 10 on EPDS were also linked with detected risk at the end of third trimester antepartum (scores of over 13 on EPDS), and with higher BMI after birth, complications during birth, unplanned pregnancy and certain sociodemographic and relationship/marriage variables.

What is the most important thing that you learned about yourself during this phase of academic research?

I learned that the best results can be reached only if you deeply believe that something can be changed by your work and engagement, which is something I am still trying to strive for.

More about the results of Dr. Stojanov: [Stojanov J, Stankovic M, Zikic O, Stankovic M, Stojanov A. The risk for nonpsychotic postpartum mood and anxiety disorders during the COVID-19 pandemic. Int J Psychiatry Med. 2021 Jul;56\(4\):228-239. doi:10.1177/0091217420981533.](#)

GUEST OF THE BULLETIN

The future of child psychiatry from the point of view of European experts

In expectation of the VI DEAPS congress

MENTAL HEALTH OF CHILDREN AND YOUNG PEOPLE—NEW REALITIES, EXPERIENCES AND KNOWLEDGE



Caring for the mental health of children and young people is one of the most important factors for preserving the health of a nation. Faced with numerous crises in the last few years, the world has faced challenges that suffer the most from those who are the most vulnerable, namely children and young people. On the eve of the VI Congress of the Society for

Child and Adolescent Psychiatry and Related Professions of Serbia (DEAPS), we spoke with Prof. Dimitris C. Anagnostopoulos, current president of the European Society of Child and Adolescent Psychiatry (ESCAP), who will be a guest at our congress.

The professor commented on the current situation:

We know that war and military conflicts hit children first. Families in the conflict zone already are preoccupied with the on-going crisis and fear for the lives of their beloved ones. Families in European countries further away are also concerned and children have expressed signs of anxiety. This adds more stress to the developmental challenges that everybody has experienced during the Covid-19 crisis. There is a huge body of literature in trauma research, which shows the devastating consequences of war and armed conflicts on children and adolescents. For a start, it has an excruciating effect on pregnant mothers and babies. It increases premature birth and infant mortality. Older children show increased levels of anxiety and depression and about 30-40 percent develop PTSD. All this leading to poorer mental and physical health continuing into adulthood. Recent research in neurobiology and neurosciences teaches us that the debt war trauma has on mental health carries over on to at least 3 generations.

In its report “On my mind: the state of the world’s children 2021, promoting, protecting and caring for children’s mental health” UNICEF requested leadership and political action

for the best of our children. The elected leaders in child and adolescent mental health in Europe at the ESCAP Board and the Policy Division appeal to the governments involved to do anything to avoid the military conflict to escalate further. We absolutely need to do everything possible to allow the children in Europe to grow up without threats and consequences of armed conflicts.

As the topic of the congress is related to the current pandemic, prof. Anagnostopoulos said:

The coronavirus pandemic has found us unprepared due to its sudden appearance and rapid global spread. The strain on our health systems, the feelings arising from the pandemic (despair, guilt, fear, panic) and the death caused by the virus have paralysed our ‘normal’ lives. We are wearing many hats during this traumatic situation; of course we are dealing with this as individuals, some as parents and then as mental health professionals.

The ESCAP board is fully aware and empathize with all our colleagues, in every country. From whatever position you hold, in the private or public sectors, you continue to support, inform, advise and help parents and children, and cooperate with educators and other professionals to face our new reality, despite your own concerns and personal sacrifices. We applaud your efforts and commitment; you make us proud of our CAP specialty.

This crisis threatens both our lives and our identity, but at the same time it strengthens the meaning of life. According to Winnicott's admission, "We have a duty to stay mentally alive" and as the Novelist poet Odysseas Elytis says:

"Let's open up to the seas, we are the captains and we must endure"; thus our concerted efforts for a common action can and will prevail. Patience is the best weapon we have in this fight. Therefore, through collaborative practices, all of us, citizens, patients, physicians, mental health professionals, and volunteers can join forces to deal with the consequences of this pandemic.

**26-28 May in Vrnjicka Banja,
Vrnjacke Terme Hotel**

More about the VI Congress of DEAPS can be found on the following [link](#)

PROMISING PROJECT

What does CoV2Soul.rs project bring?

Prof. Nađa P. Marić
Faculty of Medicine, University of Belgrade



The interdisciplinary project CoV2Soul.rs brought together experts dealing with public health, mental health and psychiatric disorders, in order to apply state-of-the-art methodology for estimating the frequency of psychiatric disorders and for detecting psychological distress on a representative sample of the Serbian population in the second year of the pandemic. This work was supported by the Science Fund of the Republic of Serbia, project number #7528289 (Clinicaltrials.gov, NCT number 04896983).

The research was carried out by the Faculty of Medicine, University of Belgrade (teaching bases Institute of Mental Health and Institute of Social Medicine), in cooperation with the Departments of Psychology, Faculty of Philosophy, University of Belgrade and Novi Sad. A large amount of data is being analyzed and publications are still pending. In the meantime, we interviewed Prof. Nađa Marić, principal investigator of the project.

Which research question CoV2Soul.rs is looking for an answer to?

There are no epidemiological studies of psychiatric disorders in Serbia, which are necessary for many reasons — every chapter of our professional publications begins with epidemiological data, and in addition to importance in education, these data are necessary for the organization of services and also for better understand of the current pandemic.

The first question we asked was how frequent are the disorders we deal with on a daily basis? This information cannot be derived from the everyday practice, we need large scale data to get to the right conclusion. We knew from the literature that their prevalence has been 10-20% (worldwide data from the relevant literature). However, at the very beginning of the pandemic, there were researchers who determined a frequency of over 30%. This would mean that at that time, every third adult resident met the criteria for making some of the 12-15 most common psychiatric diagnoses. Our study was based on a national representative adult sample (18-65) and was conducted in the later parts of the pandemic—during the summer of 2021.

How did you collect the data and what was shown?

Fifty-two trained examiners – young medical doctors and psychologists from various universities in the country, visited over 1,800 homes in 60 randomly selected municipalities throughout Serbia.

Our final sample numbered 1203 respondents, which was the required number of participants to ensure adequate study power. Our respondents were the same age as the general population in Serbia (average 43 +/- 13 years), with the same distribution by gender (48.7% male).

We found that 15.2% of adults fulfil the criteria for any psychiatric disorder according to the DSM-5 classification. Among those, frequencies of new and recurrent disorders were similar, and 4% subjects had two or more disorders at the same time. The most frequent diagnoses were alcohol use disorder (7.6%), particularly in the 18-40 year old population. Major depressive disorder in the past two weeks was diagnosed in 2.2% subjects, generalized anxiety disorder in the past 6 months in 1.9% subjects. We were surprised by the prevalence of OCD - 1.5%, which is usually around 1.0% or lower in the similar epidemiological studies. This could be explained by pandemic circumstances — checking, cleaning, and similar reactions due to the fear of infection, which are otherwise symptoms of a recently proposed new psychopathologic category — Covid-stress syndrome.

Was the prevalence during the pandemic larger or smaller than before?

We cannot provide this answer in our study because we have no comparison data. This is one hand a limitation of our study, but also something that shows its importance. As far as we can tell, there were few studies worldwide which used field interviews during the COVID-19 pandemic, but we are hopeful that we can soon compare our data with other parts of the world. We believe that the “tsunami of mental disorders” as was sometimes referred to in sensationalistic articles did not reach our territory.

What additional information will the professional and general public be able to get from CoV2Soul.rs?

- About covid-stress syndrome, frequency of distress and changes in anxiety and depression symptom severity during the pandemic
- Use of sedatives during the pandemic
- Personality characteristics as assessed by the 7-factor personality model
- Conspiracy theories during the pandemic and their prevalence
- Frequency of feelings of loneliness during the pandemic
- Quality of life during the second year of the pandemic
- Personal experiences of subjects about the effects of the pandemic on their main aspects of life

[Scientific publication](#) including prevalence data and multivariate analyses of disorders and associated factors is currently in print (Epidemiology and Psychiatric Sciences), as well as a Brochure with most of the descriptive data: Psychiatric disorders, distress and COVID-19 pandemic in Serbia: results on a national representative sample (in Serbian).

More information on <https://cov2soul.rs/>

NEWS FROM THE JC

INTERNATIONAL NEWS

Critical review of literature

New Critical review of literature was held in January 2022. This time, we reflected on a current and technologically difficult topic of digital psychiatry in the article "[mHealth-Assisted Detection of Precursors to Relapse in Schizophrenia](#)", Buck et al. This article and its good and bad sides were presented by a resident at the Institute, Dr. Teodora Jovanovic.

The aim of the study was interesting and revolutionary and deals with mobile technology implementation as means of preventing relapse in patients with psychotic disorders. The authors of the study attempt to convince us through an abstract which contains very appealing results.



Unfortunately, by delving deep into the methodology of the study, we are again faced with one of the biggest problems in modern science, the so-called "overselling" of results by presenting the results as better and less ambivalent than they objectively are. This was unfortunately seen in every CRL so far and are a systemic problem in science, where researchers are partly forced to present their results in such a manner because

otherwise, they would not be published in a good journal where positive results are more quoted and are easier to publish. By discussing the article, we found that the findings from the article were either not applicable in practice or could be called "a stretch" for practical use and that the methodological approach led to a statistically significant finding, but a clinically relevant one. This is especially interesting when comparing the text, where the significant results are discussed and the graphs which are far less impressive.

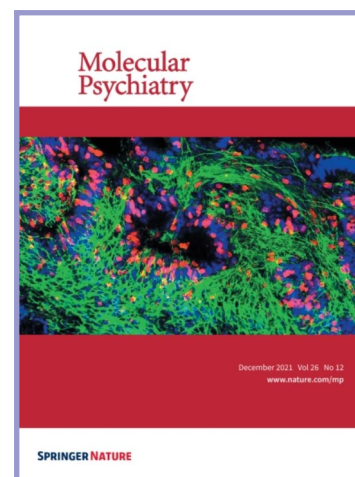
Furthermore, there are many methodological issues that were not discussed in the article that are quite important. For example, a lack of data, lack of discussion and reasons for omission of data. Moreover, there were interventions by the study team during the study which were not explained or clarified in the methods and are a unnecessary waste of resources which could be avoided if the results were presented clearly and honestly. This responsibility lies on the researchers, but also the journals which must have more flexibility with accepting negative results.

Next CRL will discuss the topic of Salivary [beta-endorphin in non-suicidal self-injury: an ambulatory assessment study](#), Störkel et al. Participation is open for anyone who wants to participate.

Genetic heterogeneity and subtypes of major depression

Major depressive disorder (MDD) is a significant public health issue. One of the main reasons for that is its high lifetime prevalence - around 15%. The clinical presentation of MDD is heterogeneous. Individuals with MDD vary considerably in their symptoms, severity, course and treatment response which is why MDD heterogeneity remains a decade-long largely unresolved challenge. Several classifications have been proposed based on symptomatology (typical vs. atypical depression; with or without concomitant anxiety), etiology (with or without traumatic experiences), course (episodic or recurrent) or treatment response (treatment responsive vs. resistant). However, this has not sufficiently improved our understanding of the underlying pathophysiology mechanisms heterogeneity of MDD.

In the January 2022 issue of the „Molecular Psychiatry“ journal the research team from the Karolinska institute in Sweden published their research entitled "[Genetic heterogeneity and subtypes of major depression](#)". The aim of the study was to evaluate genetic heterogeneity of MDD and to determine the relative importance of genetic effects on phenotypic variance. Another goal was to determine whether different MDD subtypes share identical underlying genetic risk factors.. Complex analysis of phenotypes and genotypes of the population cohort of subjects from the UK Biobank with over 500 000 subjects revealed 16 MDD subtypes of within eight comparison dimensions including presence/absence of atypical features (hypersomnia, weight gain), depressive symptom severity, comorbid anxiety disorder, recurrent vs. single-episode MDD, suicidality, functional impairment, age at illness onset and postpartum onset.



Genome-wide association study (GWAS) yielded the identification of 47 independent genomic loci significantly correlated with MDD, out of which 14 were described for the first time in the present study. The results showed that genetic profiles are only partially shared among various MDD subtypes – whereby the subtypes were constructed based on vegetative symptom severity, age at illness onset and the severity of functional impairment. Furthermore, subtypes that are more clinically challenging, e.g. - recurrent, early onset, suicidal and more severely functionally impaired, were shown to be genetically more heterogenous and had stronger genetic correlations with other psychiatric disorders. On the other hand, it has been shown that genetic factors play a significantly less role in the etiology of MDD subtypes with mild/moderate severity and those with late onset, in comparison to psychosocial factors that are significantly more dominant.

These results provide the most comprehensive evidence to date on genetic heterogeneity within MDD. The authors conclude that phenotypic complexity and heterogeneity of MDD require more detailed research into particular subtypes since they represent significantly more homogenous groups than it was previously thought, which could be an important direction for future research in this area.

XVI NATIONAL CONGRESS OF THE SERBIAN PSYCHIATRIC ASSOCIATION

19-22. 05. 2022.

Belgrade, Hotel “Mona”

More information about the congress on the following link [link](#)

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