Delovanje služb za duševno zdravje otrok in mladostnikov v času epidemije COVID-19 v Sloveniji: primerjava z drugimi evropskimi državami

Child and adolescent mental health services during the COVID-19 epidemic in Slovenia: Comparison with other European countries

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Izvleček

Namen: *Ugotoviti vpliv epidemije COVID-19 na delovanje služb za duševno zdravje otrok in mladostnikov (SDZOM) v prvem in drugem valu epidemije.*

Metode: *V raziskavo smo povabili člane Združenja za otroško in mladostniško psihiatrijo (n = 66). Raziskava je bila sestavljena iz dveh delno strukturiranih anketnih vprašalnikov. V raziskavi smo preučevali klinične in organizacijske težave SZDOM v prvem in drugem valu epidemije COVID-19 in hkrati primerjali s podobno raziskavo v drugih evropskih državah.*

Rezultati: *Osemnajst članov je izpolnilo prvi in sedem drugi vprašalnik. Pri prvem valu epidemije je 33 % članov poročalo o premestitvi svojih kolegov na oddelke COVID-19, pri drugem pa celo 43 % članov. Delova-*

Abstract

Purpose: *To evaluate the impact of the COVID-19 epidemic on child and adolescent mental health services (CHAMS) during the first and second epidemic wave.*

Methods: *Members of the Slovenian Association for Child and Adolescent Psychiatry (n=66) were invited to participate in the study. The survey involved two semi-structured questionnaires on CHAMS and clinical and organizational issues with respect to the first and second COVID-19 waves. The findings were compared with similar studies conducted in other European countries..*

Results: *Eighteen members fulfilled the first and seven the second questioner. Thirty-three percent of respondents reported that their CHAMS colleagues were assigned to the COVID-19 wards during the first and 43% in the*

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nje SZDOM je bilo pri prvem valu bolj okrnjeno zaradi javnozdravstvenih ukrepov. Pri prvem valu epidemije je polovica vprašanih opažala predvsem porast anksioznih motenj, pri drugem pa vse duševne motnje.

Zaključek: *Skrb vzbujajoča ugotovitev študije je bila okrnjena dostopnost do storitve SZDOM zaradi javnozdravstvenih ukrepov predvsem v prvem valu. Vendar je bila dostopnost v Sloveniji manj okrnjena kot drugod po Evropi. SZDOM v Sloveniji so zagotovili boljšo varnost zaposlenih pred okužbo COVID-19 glede na druge evropske države. Zaposleni v SDZOM v Sloveniji so bili večkrat premeščeni na oddelke COVID-19 kot njihovi kolegi v drugih evropskih državah, čeprav so se spoprijemali s porastom otrok in mladostnikov z duševnimi motnjami.*

second wave. The CHAMS were more affected by the public health measures for COVID-19 during the first wave. During the first wave, half of the respondents experienced worsening anxiety disorders, while an increase in all mental disorders was reported during the second wave.

Conclusion: *A concerning finding of this study was limited access to CHAMS as a result of public health measures, especially during the first wave. But the provision of services in Slovenia was not as severely limited as elsewhere in Europe. CHAMS in Slovenia were able to provide better employee safety measures in terms of COVID-19 infections compared to other European countries. CHAMS employees in Slovenia were more frequently transferred to COVID-19 wards compared to their European colleagues, despite the fact that they were faced with increasing numbers of children and adolescents with mental disorders.*

INTRODUCTION

The COVID-19 pandemic and the measures taken to prevent COVID-19 from spreading have caused enormous damage at a global level. The disease itself is responsible for more than 3 million deaths, while the restrictions forced billions of people to remain confined to their homes, which affected their daily life. Although many studies have examined the effect of the COVID-19 pandemic on mental health (1), few have focused on children and adolescents (2, 3).

The UK non-profit organization Young Minds carried out four studies that investigated the impact of the COVID-19 epidemic on the mental health of adolescents and young adults with a history of mental health needs. The first survey was conducted in March 2020 and showed that the mental health of 32% of the respondents deteriorated, while 51% agreed that their mental health had slightly worsened, and only 9% reported that the COVID-19 epidemic had no impact on their mental health. Perhaps the most worrying result of the study was that 26% of young people were unable to access psychiatric supports (4).

During the second survey, which was carried out in the summer of 2020 (31%), an increase was observed in the proportion of respondents who reported that they were no longer able to access psychiatric supports (31%). Forty-one percent of respondents said that the COVID-19 pandemic had adversely impacted their mental health, which they stated was "much worse", and 40% reported that their mental health was only "slightly worse" as a result of the pandemic. A total of 87% of respondents reported that they had felt lonely during the lockdown, while 71% stated that they were able to stay in touch with friends (4).

The third survey was carried out in autumn 2020. Fifty-eight percent of respondents described their mental health as poor before returning to school, and 69% rated their mental health as poor when they were back at school. A total of 61% reported that returning to school negatively impacted their mental health, whereas only 27% claimed that it had a positive effect (4).

In respect to the fourth survey which was conducted in January 2021, 75% of respondents reported that they had found the most recent lockdown harder to

cope with than those previous, while 24% stated that they were unable to access psychiatric supports (4).

In April 2020, The European Society for Child and Adolescent Psychiatry (ESCAP) published its first-phase survey, followed by a second-phase survey in February and March 2021 as part of the CovCAP longitudinal study aimed at identifying the impact of the COVID-19 pandemic on child and adolescent psychiatry (CAP) services in Europe. The study reached out to heads of university departments for CAP from most European countries. The survey found that the provision of services to patients was significantly affected at the beginning of the pandemic in 2020, while only a minor impact (59%) on care delivery was reported in 2021. The use of telemedicine was widely deployed throughout both waves (91%). The proportion of CAP clinics and wards that were closed or transformed for COVID-19 purposes decreased from 59% in 2020 to 20% in 2021. It was reported that the COVID-19 pandemic had a strong impact on the mental health of children and adolescents; the degree of this impact in 2021 was evaluated as medium (> 50% in 2020), strong or very strong in 2021 (80%). An increase in suicidal crises, anxiety disorders, eating disorders, and depressive episodes was reported. As a result, an increase in the number of referrals was noted (91% of respondents reported an increase in the number of referrals in 2021, while in 2020, 61% of respondents reported a decrease in the number of referrals) (5, 6).

To our knowledge, no research has been conducted in Slovenia to examine the impact of the COVID-19 epidemic on CHAMS. During the first epidemic wave, Slovenia was less affected compared to other European countries. From May 31, 2020, the proportion of deaths due to COVID-19 per million was 52 in Slovenia, 817 in Belgium, 580 in Spain and 567 in the United Kingdom (7).

During the first wave, clinical observations showed no significant increase in mental disorders or domestic violence. However, the question remained as to whether this was due to poor access to CHAMS, because some services were closed and most of them were not fully functional.

During the second wave, Slovenia was one of the most affected countries worldwide and ranked 7th in the world in terms of mortality per million (7). In contrast to the first wave, clinical observations revealed an increase in mental disorders during the second wave, most of which included anxiety disorders, eating disorders, depression, self-harm, and suicidal behavior, as well as in domestic violence. Throughout the epidemic, CHAMS were also faced with entirely new organizational challenges, such as staff shortages due to absenteeism, checking the patients' COVID-19 status, hygiene and spatial capacity issues, the use of telemedicine and other issues.

The present study aimed to evaluate the impact of the COVID-19 pandemic on CHAMS in Slovenia and to assess their ability to meet new challenges brought about by the crisis.

We sought to determine some of the aforementioned clinical observations and organizational issues that CHAMS encountered during the first and second epidemic waves: patients or staff members who contracted the infection from a positive COVID-19 patient; the number of staff who tested positive for COVID-19; sick leave due to COVID-19; staff reassigned to COVID-19 wards; major pandemic-related concerns such as the provision of CHAMS; any increase or decrease in mental disorders and domestic violence; and the use of telemedicine and non-chemical addictions. We compared our results with the CovCAP longitudinal study, which was carried out in most European countries.

METHODS

Two self-report questionnaires were produced for the research. The first questionnaire contained 40 questions and referred to the first wave of the COVID-19 epidemic (March 12, 2020 to May 31, 2020). The first phase-survey was carried out between September 10, 2020 and October 10, 2020. The second questionnaire contained 41 questions and referred to the second wave of the COVID-19 epidemic (October 19,

2020 to March 5, 2021). The second-phase survey was carried out between April 13, 2021 and May 13, 2021. Most survey questions were comparable to the first 2020 ESCAP CovCAP survey and adapted for use in hospital and outpatient settings (5, 6). Permission to use the questions was obtained from the authors of the ESCAP CovCAP study.

Both self-report questionnaires adopted a multi-stage process based on a Delphi approach. The items were ranked by importance, then reduced and assembled to produce a final 40- and 41-item questionnaire. The questionnaires included items related to the following sections: demographics; screening for COVID-19 in CHAMS; COVID-19-induced changes in psychopathology; provision of CHAMS; effects on teams, size and capacity of CHAMS; and current use of CHAMS. The final section of the questionnaire gave respondents an opportunity to provide further written comments.

The questionnaires were created using the online 1KA tool and emailed to members of the Slovenian Association for Child and Adolescent Psychiatry (SACAP) (n=66) covering all CAP specialists, CAP trainees, psychologists, social workers, pedagogues, and physicians of other specialties.

RESULTS

The first questionnaire was completed by 18 members (16 women and two men) of the SACAP (27% response rate). Four respondents were in the 30–40 year age group, six in 40–49 year age group, five in the 50–59 year age group, and three in the 60–69 year age group. The occupational group of respondents included 14 specialists in child and adolescent psychiatry, two residents of child and adolescent psychiatry, one psychologist/clinical psychologist and one pedagogue/expert pedagogue. The second questionnaire was completed by seven members (11% response rate), all of whom were female. Two respondents were in the 30–40 year age group, one was in the 40–49 year age group, three in the 50–59 year age group, and one in the 60–69 year age group. The occupational group of respondents included four specialists in child and adolescent psychiatry, two residents of child and adolescent psychiatry and one social worker.

We present further results immersed in discussion and comparison with the ESCAP study conducted in other European countries. The authors invited readers to contact them for complete statistical data related to the results.

DISCUSSION

During the first COVID-19 epidemic wave, Slovenia rapidly implemented measures to respond to the COVID-19 outbreak. As a result, there were considerably fewer infections in the country compared to other European countries. In contrast, Slovenia experienced one of the highest numbers of COVID-19-related deaths during the second wave. The second wave lasted longer than the first (7, 8).

Patients or staff members who contracted the infection from a positive COVID-19 patient

During both waves, our results showed that no infection was transmitted from a COVID-19 patient to other patients or healthcare professionals surveyed, which indicated excellent compliance with epidemiological guidelines. Our results are consistent with the ESCAP CovCAP study results with a majority of respondents (90%) reporting of no person-to-person transmission of COVID-19 (5).

Number of staff tested positive with COVID-19

During the first epidemic wave, all of the respondents in the current study reported that less than 1% of their employees tested positive for COVID-19, while 59% of respondents taking part in the ESCAP survey provided the same answer. During the second epidemic wave, nearly one-third of respondents in our study indicated that 1–5% of employees tested positive for COVID-19. We may conclude that, in comparison to other European countries, Slovenia achieved a higher level of employee safety (5, 7).

Sick leave due to COVID-19

During the first epidemic wave, 61% of the respondents reported that the team took no sick leave due to COVID-19 infection. However, this was true for only 14% of the respondents when asked about the second wave. Moreover, nearly a third declared that 5–10% of staff took sick leave due to COVID-19. It should be noted that it is not possible to compare this study to the ESCAP CovCAP study, as a different question about sick leave was posed (5).

Staff reassigned from CHAMS to COVID-19 wards

In respect to the first epidemic wave, 33% of respondents declared that at least someone from the team was reassigned to a COVID ward. Only 21% of such reassignments occurred in other European countries during the first epidemic wave. For the second epidemic wave, 43% of the respondents in our study gave the same answer. The findings demonstrate Slovenia's well-known shortage of medical personnel, and draw attention to the fact that the country's mental health services, despite the intensified workload due to a higher number of patients with mental disorders, were not excluded from the pool of professionals who were recruited to work in COVID-19 wards. The results also indicated that CHAMS personnel in Slovenia managed a heavier workload as a result of being reassigned to COVID wards compared to their European peers (5).

Impact of COVID-19 epidemic on CHAMS for patients

In respect to the first epidemic wave, 72% of respondents reported that the provision of services had been affected to a minor degree, but 29% reported that they had been affected to a major degree during the second wave.

The results were consistent with the fact that, during the first wave, Slovenia was faced with an even larger closure of CHAMS than during the second wave. Despite the ECAP guidelines clearly advocating for accessibility and non-closure of CHAMS, some facilities closed their services, and the majority reduced their activities in Slovenia. Therefore, SACAP made significant efforts and called upon various government organizations and related ministries to ensure that mental health services would remain open during the second wave (9, 10).

Restricted CHAMS for parents

During the first and second wave, approximately one-third of respondents reported restrictions on parental access. On the other hand, 75% of European respondents reported restricting parental access to therapy during the first epidemic wave. The second ESCAP survey did not include this question (5).

How public health measures aimed at curbing the spread of COVID-19 affected the provision of CHAMS.

During the first wave, a clear majority of respondents reported that they were most affected by the closure of services, whereas during the second wave, the respondents reported that service closures had a substantially lower impact on them. The findings of our survey are comparable to those of the ESCAP, which examined the impact of COVID-19 on CAP, with the exception of hospital closures, for which only 32% of European respondents reported that hospital ward closures affected them the most, compared to 69% of respondents in our study (5).

Use of telemedicine

Telemedicine was used by 22% of respondents prior to the initial epidemic wave, but during the second wave, 67% of respondents availed of telemedicine. These findings supported the fact that the epidemic compelled us to make greater use of telemedicine.

Major pandemic-related concerns: The provision of CHAMS

During the initial epidemic wave, 88% of respondents reported that they were primarily concerned about insufficient contact with patients and families. During the second epidemic wave, they were more concerned about their inability to ensure the provision of specific therapeutic groups (80%). These findings are comparable to those of the ESCAP study, apart from the financial sustainability of services due to reduced patient treatment (drop-out rates) which was a major concern of 47% of Europeans and only 24% of Slovenian respondents during the first wave.

The impact of the COVID-19 epidemic on the mental health of children and adolescents

During the first epidemic wave, less than one-third of respondents believed that the epidemic had substantially impacted the mental health of children and adolescents. During the second wave, 80% of respondents reported that the epidemic had a strong impact on the mental health of children and adolescents. In the ESCAP CovCAP survey of the initial epidemic wave, more than half of the respondents reported that the epidemic had a moderate impact, while one-third of respondents believed that it had a strong impact on the mental health of children and adolescents in the region (Figure 1).

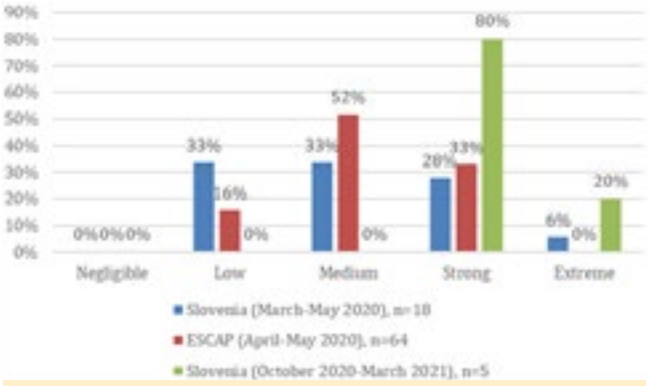

Figure 1. *What impact has the COVID-19 epidemic had on the mental health of children and adolescents in your region?*

The findings revealed that during the first wave, there was a lower demand and fewer requests for CHAMS as a result of problems accessing the services, service closures and restrictions on availing of these services throughout Europe.

How the epidemic affected the number of referrals.

Almost half of the respondents reported that there was no change in the number of referrals to CHAMS during the first wave, whereas during the second wave, an increase in the number of referrals was noted by all respondents. Comparable results were reported by the ESCAP survey, with the greatest discrepancies noted during the initial epidemic wave, when a lower referral rate was observed by 61% of ESCAP respondents (Figure 2).

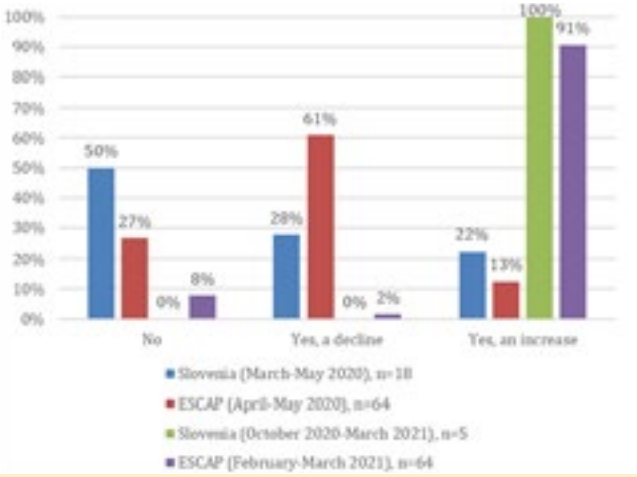

Figure 2. *During the epidemic, what change did you observe in the number of patients who were referred to your facility for treatment?*

Increase of mental disorders

During the first epidemic wave, more than half of the respondents noted an increase in the number of cases of anxiety disorders; however, they did not report an increase in other mental health disorders. A sizeable change occurred during the second wave, at which time all of the respondents reported an increase in mental health disorders; all (100%) respondents observed an increase in depression, anxiety, eating and adjustment disorders, and in suicidal behavior. Moreover, 80% of the respondents noted an increase in behavioral and psychotic disorders, while 60% observed an increase in obsessive compulsive disorders. The ESCAP survey did not assess the change in the frequency of separate mental disorders.

Patients experiencing increased domestic violence

While most respondents did not notice an increase in domestic violence among their patients during the first wave, all of the respondents observed an increase during the second wave. It can be speculated that, rather than an actual decrease in domestic violence during the first wave, people had fewer opportunities to report such incidents at this time.

Non-chemical addictions during the epidemic

In 2016, the prevalence of problematic Internet use among Slovenia's adult population was 3.1%, and 14.6% of those aged 18 to 19-years-old. (10) While

most respondents did not observe an increase in non-chemical addictions during the first wave, a major increase was noted during the second wave. The findings were to be expected, particularly given that children and teenagers spent more time online due to the restrictions that were in place.

Limitations

A major limitation of this survey was the low response rate. The respondents were invited to participate in the survey twice. The ESCAP also reported poor responsiveness in the CovCAP survey. Although the respondents for the CovCAP survey were invited on four different occasions to participate in the survey, a 50% and 27% response rate was recorded for the first and second waves, respectively. The lower response rate to the second survey in both Slovenia and Europe could be attributed to increased workloads and the duplication of surveys (5, 6). In addition, the sex distribution of the sample was skewed toward females, which reflected the current situation in the field.

A further limitation of the study was that most of the questions were subjective in nature. Certain questions required a rough estimate of conditions reflecting respondents' overall impression. The comparison between the first and second survey is especially challenging as the respondent only partially overlap. The CovCAP survey encountered the same issues. Nonetheless, the results of the current survey may be regarded as credible as they are comparable to clinical observations, the observations of those working in other services or institutions, and the findings of the European CovCAP study. It is strongly recommended that our findings be compared with public health services data (NIJZ, ZZZS) regarding the number of referrals, services, number mental disorders, and other variables, as soon as such data become available.

CONCLUSION

A concerning finding of this study related to the first wave, during which time there was limited access to CHAMS as a result of the public health measures that had been implemented to combat the outbreak. However, the provision of services in Slovenia was not as severely restricted as elsewhere in Europe. During the second epidemic wave, CHAMS were more accessible and respondents reported an increase in the number of referrals, as well as a considerable increase in many mental disorders among children and adolescents. CHAMS employees in Slovenia were more frequently transferred to work in COVID-19 wards compared to their colleagues in other European countries.

What have we learned? First, mental health specialists who were faced with increased workloads as a result of a higher number of patients with mental disorders should not have been reassigned and transferred from CHAMS to COVID-19 wards. This study highlighted a comprehensive need for greater sensitivity and attunement towards mental health in Slovenia. Second, it is vital that all services for children and adolescents remain accessible, especially during times of crises. Third, it is crucial to continue to include parents in the therapeutic environment during an epidemic or other periods of crisis. Fourth, the use of telemedicine has proven very beneficial in helping children, adolescents and their parents to continue engaging in the therapeutic process in the most effective way possible.

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Conflict of interests

The authors have no conflict of interest to declare.

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Ethical approval

The approval of the Ethical Committee of the Republic of Slovenia was obtained to conduct this study. (No.: 0120-185/2021/3).

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