

Practical guidelines for management of patients with suspected or confirmed COVID-19 hospitalized in a child and adolescent psychiatric ward

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Summary

The novel coronavirus disease (COVID-19) epidemic – in addition to its many widely described negative consequences – has created a challenge for the mental health care system in every country, including Poland to safely manage psychiatric disorders in addition to preventing and treating COVID-19. In Poland, online mental health services are provided for the outpatients. Still there are patients with severe psychiatric disorders who have suspected or confirmed COVID-19 and need to be treated in a psychiatric hospital. The Department of Child and Adolescent Psychiatry of the Medical University of Warsaw was appointed by local authorities to hospitalize children with mental disorders and with confirmed or suspected COVID-19. This created an urgent need to adapt our department for treating COVID-19 infected patients. As far as we know no guidelines for psychiatric hospitals management during the COVID-19 pandemic are available in English. In this manuscript, we present our guidelines regarding safe management of patients with suspected or confirmed COVID-19 in the Department of Child and Adolescent Psychiatry of the Medical University of Warsaw.

Key words: Covid-19, guidelines, psychiatric hospital

Introduction

The novel coronavirus disease (COVID-19, caused by severe acute respiratory syndrome coronavirus 2 – SARS-CoV-2) epidemic has created a challenge for the mental health care system in every country, including Poland, to safely manage psychiatric disorders in addition to preventing and treating COVID-19. Mental health services are extremely important in the time of epidemic, as people are experiencing psychological problems, such as anxiety, depression, and sleep disorders [1]. In Poland,

online mental health services are provided for the outpatients. Still there are patients with severe psychiatric disorders who have suspected or confirmed COVID-19 and need to be treated in a psychiatric hospital.

Initially, the Ministry of Health recommended creation of psychiatric wards for patients infected with SARS-CoV-2 for adults, while children should be hospitalized in infectious wards. Psychiatric treatment in these wards would be carried out with the participation of consultative psychiatrists. Currently, the recommendations of the Ministry of Health provide for the creation of two psychiatric wards for children and adolescents with confirmed COVID-19 in Poland (these recommendations are available on the website of the Ministry of Health: <https://www.gov.pl/web/zdrowie/wytyczne-dla-poszczegolnych-zakresow-i-rodzajow-swiadczen>).

The Department of Child and Adolescent Psychiatry (DCAP) of the Medical University of Warsaw was appointed by local authorities to hospitalize children and adolescents aged 3–18 years with confirmed COVID-19 or symptoms of SARS-CoV-2 infection who require emergency psychiatric hospitalization. In accordance with the guidelines of the Polish Ministry of Health concerning a patient's admission to our Department of Child and Adolescent Psychiatry, the patient must meet the criteria for admission to a psychiatric hospital in accordance with Article 23 (1) of the Mental Health Protection Act of 19 August 1994, regardless of whether he/she give informed consent or not, and at the same time:

- a) have confirmed COVID-19 or
- b) have the following symptoms: body temperature 38C or higher, dyspnea (more than 20 breaths per minute) and cough, or
- c) be in home quarantine due to possible SARS-CoV-2 exposure.

Due to the assumption that patients requiring psychiatric hospitalization are not able to cooperate in the area of sanitary recommendations, The Ministry of Health issued a recommendation that patients quarantined and requiring psychiatric hospitalization should be admitted to wards for patients with confirmed or suspected COVID-19.

As in other psychiatric wards in our department patients share common dining and bathroom spaces. Normally psychiatric inpatients participate in group activities which increase patient to patient contact. Due to their poor self-control and inadequate insight, they may be incapable of practicing infection control measures to protect themselves and others [2]. This created the necessity to reorganize our work for the time of COVID-19 epidemic.

As far as we know, The Chinese Society of Psychiatry provided recommendations for psychiatric hospitals management during the COVID-19 epidemic, such as: psychiatric hospitals should reduce outpatient visits, tighten admission criteria, and shorten the length of hospitalization. For newly admitted psychiatric patients, isolation wards should be set up and visiting should be suspended to minimize the potential risk of infection [3, 4]. So far, no English translation of these documents is available.

Purpose

The purpose of these guidelines is to provide detailed instructions to the staff of the Department of Child and Adolescent Psychiatry regarding management of patients with suspected or confirmed COVID-19.

Definitions

COVID-19 is a disease caused by the new coronavirus (SARS-CoV-2). SARS-CoV-2 is transmitted via droplets and fomites during close unprotected contact. Typical signs and symptoms include: fever, dyspnea, dry cough, headache, fatigue, abdominal pain. Children may have an asymptomatic infection. They can be carriers of the virus, which is associated with the risk of spreading the infection among people in close proximity [5, 6]. A person suspected of being infected with SARS-CoV-2 is anyone who: had close contact with a person with a laboratory confirmed SARS-CoV-2 infection or a person under quarantine within the last 14 days (close contact of a probable or confirmed case was defined as the definition of ECDC from 02.03.2020 [7]).

Rules of conduct

1. Each patient who meets the criteria specified by the MoH (see above) is admitted to the Infectious Emergency Department (IED-COVID) in accordance with patient streaming algorithm.
2. A patient with confirmed COVID-19 is consulted by a psychiatrist in the IED-COVID. In case of any unpredicted behavior of the patient, the consultant psychiatrist puts on 'full protection' personal protective equipment (PPE): a reinforced surgical gown, a FFP3 or FFP2 mask, 2 pairs of gloves, an eye/face protection – goggles or face shield, a medical cap, an apron. The psychiatrist decides whether a patient with a mental disorder poses a threat to his/her own life or life and health of others and decides whether to admit the patient to the DCAP or refer him/her to his/hers current place of stay or treatment.
3. A patient with a temperature above 38°C, dyspnea (breaths >20/min.) and cough is hospitalized in the Observation-infectious Ward where he/she is consulted by a psychiatrist. Depending on the consultation result and the test result:
 - a) if he/she requires psychiatric hospitalization due to the threat to life and health and has a positive test result, he/she is hospitalized in the DCAP;
 - b) if he/she requires psychiatric hospitalization and has a negative test result, he/she is discharged and referred to another psychiatric hospital for uninfected children and adolescents;
 - c) if he/she does not require psychiatric hospitalization, the decision is made by the Observation-infectious Ward.

4. A patient in quarantine and showing no signs of infection is consulted in the IED by the consultant psychiatrist. Due to the inability to predict the patient's behavior, the consultant psychiatrist puts on 'full protection' PPE. The consultant psychiatrist decides if a patient with mental disorder poses a threat to his/her life or life or health of other people, and decides where he/she will wait for the test result for COVID-19: hospitalized in the DCAP or at home under the strict supervision of the parents. After receiving the test results, depending on the result, the patient is hospitalized in the DCAP or is referred to another psychiatric hospital for uninfected children and adolescents.
5. Pediatric and neurological examination should be performed in the IED-COVID or in the Observation-infectious Ward to avoid having to be re-examined in the DCAP.
6. Admission to the psychiatric ward takes place after a telephone information from the IED-COVID.
7. Before the patient is admitted to the DCAP, an isolation room is being prepared.
8. In the DCAP, 10 patients can be hospitalized at the same time, which is the number of patients corresponding to the number of isolation rooms.
9. The patient with one caregiver (both in surgical masks) is admitted to the ward by a nurse wearing a surgical mask, an apron and gloves and is immediately directed to the isolation room the number of which was specified earlier in the phone call. During this time, the staff should maintain spatial distance of at least 2 m from the patient.
10. A maximum of one caregiver stays with the child in the ward if possible. The caregiver does not leave the isolation room for the entire period of hospitalization. The caregiver should be informed about the risk of remaining in an isolation room with the infected child and about the prohibition to leave the room (informed consent must be obtained from the caregiver on admission). The caregiver communicates with the staff by phone or through closed doors which enable eye contact thanks to the glass placed there and good audibility.
11. Entries to the isolation room must be kept to a minimum; only one nurse from the shift (if possible) and only one doctor enter the isolation room:
 - a) the doctor collects information from the caregiver and conducts a psychiatric examination in the patient's isolation room at a distance of at least 2 meters from him/her, observing the safety zones marked in the room – during the interview and the examination the patient and the caregiver remain in the marked safe zone;
 - b) rules for putting on and taking off personal protective equipment – according to a separate procedure in force in a given healthcare facility;
 - c) pediatric, neurological and psychiatric examination, nursing procedures, blood sample collection of a new or agitated patient are performed in 'full protection' PPE;

- d) psychiatric assessment, interview and mental status examination of a stable patient with established diagnosis: the principles of droplet isolation precautions are used and the following personal protective equipment is used: a surgical mask, an apron, goggles or visor, disposable gloves;
 - e) blood samples for follow-up tests are collected by a nurse – if necessary with the help of a doctor as described in a separate procedure in force in a given healthcare facility;
 - f) before entering the isolation room the doctor, if possible, informs the nurse about the necessity of additional equipment;
 - g) depending on the patient's clinical condition, the use of reusable instruments (blood pressure monitor, cardiomonitor, pulse oximeter) should be kept to a minimum. Equipment used in the isolation room should remain in the room.
12. In situations where the intervention requires only talking to the caregiver (questions about patient symptoms, answers to parent's questions), the doctor should contact the parent by phone, through the closed door of the room or in writing.
 13. A register of all persons who enter the isolation room is kept by a nurse. (responsible person: shift nurse); the list is kept at the nurses' station.
 14. The caregiver should perform self-observation (daily temperature measurements, COVID-19 symptom assessment). If the caregiver is in a good general condition, he/she stays in the isolation room with the child. In case of deterioration of the caregiver's general condition, he/she should be taken to the hospital treating adults suffering from COVID-19.
 15. Any suspected or confirmed SARS-CoV-2 infection should be reported to the County Sanitary Inspector in Warsaw.
 16. Any confirmed SARS-CoV-2 infection should be reported with a list of people (patients and staff) who had close contact with a COVID-19 confirmed person without the recommended PPE
 17. Nutrition: the staff delivering meals do not enter the psychiatric ward. Meals are moved into boxes in the vestibule. Meals for the patient and the caregiver are provided by the psychiatric ward staff. The patient's family may not enter the DCAP. If the family has to pass on items, one person from the outside leaves these items in the vestibule. Meals and oral medications are delivered to the patient's room by a nurse wearing a surgical mask, an apron and gloves while the patient and the caregiver remain in the marked safety zone. The patient receives oral medications in the kidney bowl, he/she takes the medication under the visual control of the nurse (through the window in the door). In case of doubt as to the patient's cooperation, the drug is administered by a nurse wearing 'full protection' PPE in direct contact with the patient.

18. The rules for collecting and labeling biological samples from a patient are described in a separate guidance in force at the University Clinical Center of the Medical University of Warsaw.
19. In case the patient is agitated and poses an epidemiological threat, it is possible to isolate the patient according to the Mental Health Protection Act of 19 August 1994. In accordance with the Act, this measure may be applied to the patients with mental disorders when they:
 - a) wage an attempt against their own life or health, or life or health of others;
 - b) commit a crime against public safety;
 - c) violently destroy or damage objects in their environment;
 - d) gravely disturb or obstruct the functioning of medical entity providing mental health services.

The current recommendations regarding the risk of SARS-CoV-2 infection impede the use of direct coercion measures described in the Mental Health Protection Act of 19 August 1994, when the patient poses a threat to him/her or others. The practical instructions for applying direct coercion to a patient with suspected COVID-19 are described below.

Guidelines

1. In case the patient is agitated, make sure that he/she is not able to leave the isolation room (by closing the door).
2. Prior to applying direct coercion to the patient, he/she should be informed about it.
3. As soon as possible, a four-member immobilization team should be organized (doctor, nurse, paramedic, another staff member).
4. The immobilization team with a bed equipped with straps goes near the patient's room (the personal protective equipment is kept on the bed).
5. As soon as possible the immobilization team puts on 'full protection' personal protective equipment with goggles instead of visors.
6. The patient is asked to move away from the door behind the marked line.
7. Regardless of whether the patient obeyed, three of four members of the immobilization team enter the room trying to calm the patient down and the fourth one enters the room with the bed equipped with straps.
8. If there is a caregiver in the room, he/she is asked to move to the marked safety zone.
9. If the patient still needs direct coercion, the patient is being immobilized.
10. As far as possible the observation of the patient's condition is carried out by the nurse through the window in the door. If possible, the observation is carried out by the caregiver, if necessary, he/she measures patient's vital signs.

The urgent need to adapt our department for treating SARS-CoV-2 infected patients left several unresolved patient care issues that should be reconsidered:

1. Due to the need to isolate each patient, only a patient whose current behavior poses a threat to his/her own life or life and health of others may be admitted to the DCAP. Patients with problems such as suicidal thoughts and self-harm behaviors but without suicidal tendencies should stay home and be supervised by their parents. For many people keeping children safe at home can be challenging. In addition there are data which show that violence and vulnerability increase for children during periods of school closures [8]. This creates the risk of worsening patient's mental condition while staying at home.
2. Interviewing a patient who stays in an isolation room with the caregiver and talking to the caregiver in the patient's presence can create a risk of not receiving important information about the patient's mental status and his/her social situation.
3. The conditions in which the patient and his/her caregiver are in the isolation room during the entire hospitalization and the fact that they are unable to leave the room may not be helpful in overcoming the mental crisis.
4. The caregiver is partly responsible for assessing the mental and physical condition of the patient, which can be difficult if the caregiver does not cooperate with the staff.

At present— considering the very small number of patients meeting the criteria for admission to the DCAP during the SARS-CoV-2 epidemic – it seems that the existence of two psychiatric wards for children and adolescents in Poland is not necessary

We hope that sharing our guidelines will be helpful for other psychiatric institutions for children providing psychiatric treatment for COVID-19 patients.

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