Neurological Patients during the Covid-19 Pandemic

Pacientes neurológicos durante a pandemia de Covid-19

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Abstract

With the current pandemic caused by the severe acute respiratory syndrome coronavirus 2 (SARS-CoV-2), measures of social isolation were necessary, and this resulted in the interruption of several treatments. Regarding neuro-oncological patients, especially those with central nervous system (CNS) disorders, this interruption can cause serious damage or even compromise the success of the treatment in the future. It is essential that each case be evaluated separately to decide how to continue treatment during the pandemic, always considering the risk of SARS-CoV-2 infection and the benefits that the treatment will bring. The policy of not prescribing potentially toxic drugs, chemotherapy, and immunosuppressive therapies, as well as the use of techniques like stereotactic biopsy and telemedicine are important strategies at this time.

Keywords

- coronavirus
- neuro-oncology
- treatment

Resumo

Com a atual pandemia causada pelo coronavírus da síndrome respiratória aguda grave 2 (*severe acute respiratory syndrome coronavirus 2*, SARS-CoV-2, em inglês), foram necessárias medidas de isolamento social que resultaram na interrupção de alguns tratamentos médicos hospitalares. Em relação aos pacientes neuro-oncológicos, principalmente aqueles com distúrbios do sistema nervoso central (SNC), uma interrupção pode causar sérios danos ou até mesmo comprometer o sucesso do tratamento no futuro. Assim, de acordo com a literatura encontrada, é de fundamental importância que cada caso seja avaliado individualmente, para que se decida como prosseguir com o tratamento durante a pandemia, sempre considerando o risco de infecção por SARS-CoV-2 e os benefícios relacionados ao tratamento. São estratégias importantes neste momento a política de não prescrição de medicamentos potencialmente tóxicos, quimioterapia e terapias imunossupressoras, além do uso de técnicas como biópsia estereotáxica e telemedicina..

Palavras-chave

- coronavírus
- neuro-oncologia
- tratamento

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The current coronavirus disease 2019 (Covid-19) pandemic has brought about measures of social isolation which have resulted in the interruption of several health treatments. Regarding neuro-oncological patients, especially those with central nervous system (CNS) disorders, this interruption can cause serious damage or even compromise the success of the treatment in the future, since surgical resections are being avoided as much as possible, and several rehabilitation services are not available due to the closure of units and the reorientation of teams to combat Covid-19. Therefore, certain information on how to organize these treatments in the current scenario is extremely relevant and should always be followed with due precautions, as these patients are more likely to develop the most severe forms of Covid-19, especially if they have undergone chemotherapy or surgery recently.^{1,2}

First, it is essential that each case be evaluated separately to decide how to continue treatment during the pandemic, always considering the risk of infection by severe acute respiratory syndrome coronavirus 2 (SARS-CoV-2) and the benefits that the treatment will bring. In addition, emergency cases or those with a high chance of cure should not be extended.³ It is essential to consider the reuse of available drugs to treat and prevent brain diseases associated with Covid-19.⁴ However, more than ever, the policy of not prescribing potentially toxic drugs, systemic chemotherapy, and immunosuppressive therapies is mandatory, such as re-irradiation combined with steroids, for which the evidence of benefit is not clinically relevant in the current scenario. In situations in which there are no immediate urgent needs and long-term treatment is likely to bring benefits, such as in patients with low-grade astrocytomas or oligodendrogliomas, a more conservative dose of chemotherapy should be considered.⁵

The use of stereotactic biopsy has already been described, which at least offers a definitive diagnosis for severe conditions and can elucidate malignant tumor characteristics, with the advice that the best possible treatment should be followed in view of the current incapacity for maximum tumor resection. At the Mount Sinai Hospital, in New York, patients are always considered positive for Covid-19 until proven otherwise, and maximum precautions have been taken, including regarding the patients in need of intubation and in the postoperative setting.²

Another factor to be considered is telemedicine. In Brazil, the Federal Council of Medicine already recognizes the possibility of remote medical care during the fight against Covid-19, as well as in other countries in which the performance of these virtual consultations is made available when

feasible.⁶ However, for face-to-face procedures, patients should be tested for Covid-19. In institutions in which the test is not available, there should be a questionnaire regarding symptoms, and patients should be tested when available.⁷ In addition, some processes must remain accessible, such as ambulatory radiology, with the establishment of protocols that limit the number of patients in the waiting room and provide protective masks for everyone.⁸

It is also necessary to consider during this period the frequency of clinical follow-up at regular intervals for patients who have been stable and without intervention for years, as is the case of many individuals with brain tumors. Visits to the hospital environment can be divided into defined populations with more severe cases.⁴

Concluding, clinical follow-ups differ in relation to the conditions of the patients, according to the severity of each case. That is why the benefits and risks that the continuity of treatment will bring must be considered, with precaution and engagement on the part of the entire team involved.

Conflict of Interests

The authors have no conflict of interests to declare.

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