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# NEAR DEATH EXPERIENCE IN A PATIENT WITH NEUROLOGICAL SYNDROME WITHOUT DEFINED ETIOLOGY

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Abstract: Introduction: The near-death experience is a phenomenon that has intrigued and fascinated scholars for decades. These are reports of individuals who went through an experience that includes sensations, among others, characterized as being outside one's own body, perception of a bright and intense light, encounters with loved ones who are dead or alive. Objective: A case registered in the neurology ward of Hospital de Base de São José do Rio Preto, in which, despite extensive investigation of neurological etiologies, no etiological diagnosis was found that justifies the presented condition associated with an experience of almost death (NDE). Final considerations: Medicine often presents us with cases that escape our full understanding, leading us to question the true meaning of life and health.

**Keywords**: Near-death experience, NDE, Sensory motor neurological syndrome

# **INTRODUCTION**

The near-death experience is a phenomenon that has intrigued and fascinated scholars for decades. These are reports of individuals who went through an experience that included sensations characterized, among others, as being out of one's own body, perception of a bright and intense light, encounters with loved ones who are dead or alive, as well as witnessing and/or be an active participant in an event in more than one place simultaneously.

Although there are still many doubts and questions about what really happens during a near-death experience, more studies are beginning to be carried out to better understand this phenomenon and its physiological effects on the human body.

### CASE REPORT

Patient MHSC, 85 years old, female, previously independent for basic and instrumental activities of daily living, with a

previous history of abdominal surgery due to diverticulitis for over 30 years and mild depression for 4 years with regular follow-up. She presents a report of a 1-week condition of diffuse abdominal pain in cramps with episodes of vomiting on the last day and seeks the BHU in her hometown (José Bonifácio) for hydration. Around 10 am on 03/31/23, during the application of saline solution containing only B complex and vitamin C (according to guidance from the SAMU team), there was an episode of contact interruption with a catatonic posture that lasted up to 15 hours, when she had already been referred to the municipal hospital of origin. After this time, the daughter mentions, that patient returned with contact associated with tetraparesis with a more pronounced motor deficit on the left and verbalizing that he had to leave his body to help his grandson who was in trouble at that very moment. Being forwarded to São José de Rio Preto for evaluation on account.

At the Hospital de Base in Rio Preto, an anamnesis was carried out with the patient and daughter, and it was described that abdominal pain was recurrent, 6 in 6 months, characterized by colic of moderate/strong intensity unrelated to fasting or eating, with no change in bowel habits, weight loss, anorexia or other complaints; showing improvement after symptomatic administration, and which started after abdominal surgery more than 30 years ago. On physical examination, the patient was hemiplegic on the left and hemiparetic on the right. There were no reports of rhyme deviation or deletion of the nasolabial fold. No reports of tonic-clonic seizures or similar previous episodes. An investigation was initiated with brain MRI and CSF collection, which demonstrated the presence of diffuse lesions in the white matter on imaging, however, without contrast enhancement and without the presence of masses or bleeding; the cerebrospinal fluid, on the other hand, showed only a slight increase in proteins without significant associated alterations. Concomitantly, she presented chest pain, being diagnosed as type 2 infarction by the cardiology team, with stratification planning after elucidation of the neurological condition, since the patient maintained hemodynamic and clinical stability.

In the infirmary sector, clinical history was collected again with the patient herself, who appeared lucid and oriented in time and with preserved cognitive functions, and the daughter of the patient who had accompanied her since her initial care. Both denied the presence of neurological symptoms prior to the event, without severe mood swings that

would justify changes in behavior and/or the presence of previous or recent infectious events. The only new information being the fact that at the time the patient started catatonia, the grandson was actually involved in a serious car accident, in another location and that coincided with the initial time of care, information that was unknown to the patient until the moment and by the daughter who accompanied her.

Among the tests carried out, blood count, renal function, electrolytes, infectious screening, serologies (HIV, syphilis, Hepatitis B, C), autoantibody research and among others were requested, as shown in the figure in table 1.

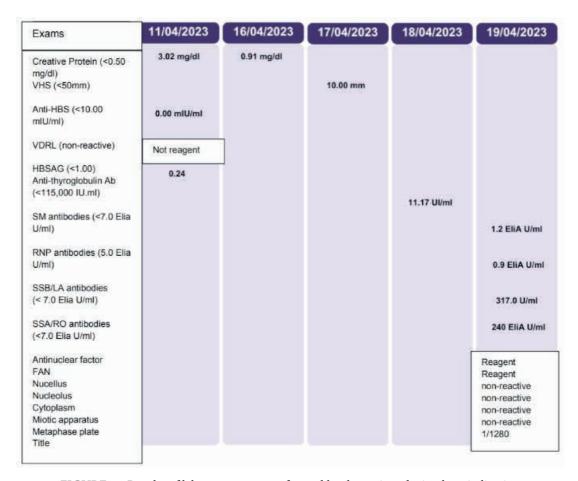
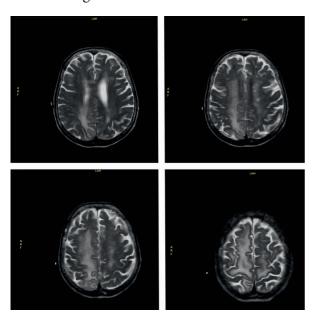


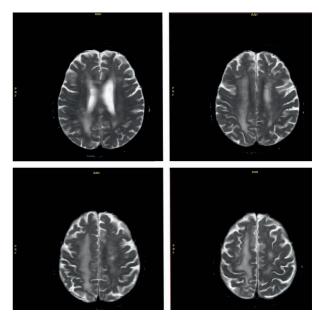
FIGURE 2 - Results of laboratory tests performed by the patient during hospitalization

During investigation, the patient started physiotherapy with a multidisciplinary team with gradual recovery of the movements of the 4 limbs starting in a craniocaudal way. Psychiatry and rheumatology assistance were requested to rule out other psychological/systemic conditions.

Due to gradual improvement without specific therapy, a new study with MRI with complement was chosen for reassessment with extension to the spine in search of signs of demyelinating disease. Results showed no change in relation to initial exams and no extra findings in the spine. After discussion between neurology and clinical medicine, it was decided to perform a cycle of pulse therapy with corticosteroids due to a condition compatible with a possible demyelinating substrate disease for 5 days and reassessment afterwards, with a new neuroimaging, as shown in figure 3



(a) pre corticosteroid therapy



(b) post corticosteroid therapy
FIGURE 3 - Brain MRI images before (a) and
after (b) pulse cycle of corticosteroid therapy
with methylpredinisolone

After a corticoid cycle, there was no clinical difference, and the patient continued to show gradual improvement slowly. Chosen, after assessment of cardiology due to infarction, hospital discharge with outpatient follow-up with neurology with follow-up.

### DISCUSSION

The discussion about the near-death experience is quite complex, as it is necessary to consider both the subjective perspective of the individual and the scientific and philosophical aspects surrounding the phenomenon.

Firstly, it is important to consider that the near-death experience is a subjective phenomenon and, therefore, difficult to measure and objectively evaluate, even with the bias that patients are often in serious conditions that occur with alterations in the level of consciousness that make it even more difficult further the evaluation process. It is also necessary to account for the fact that the individual's personality and religious or spiritual beliefs can often influence the

reporting of the experience.

However, many researchers have sought to better understand these experiences through studies in order to show that our consciousness may not be a simple synonym of our mind or even body. Corroborating this statement is the fact that many reports occur in patients with clinical conditions, such as cardiorespiratory arrests, where cerebral blood flow is impaired and there would be no sensory perception that could justify a precision rich in details such as those found in several reports.

Finally, it is important to discuss the philosophical and scientific implications of near-death experiences. Some argue that these experiences provide evidence of a life

beyond death or the existence of an immortal soul, while others suggest that they can be explained by neurological or psychological processes. This discussion, perhaps in the near future, will become central to a better understanding of the true meaning of health.

# **FINAL CONSIDERATIONS**

Medicine often presents us with cases that escape our full understanding, leading us to question the true meaning of life and health. Near-death experiences may be a scope of study, in the future, that will show us that our consciousness is perhaps something more and not just a synonym of our mind or even body.

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