

# Opsoclonus investigation: how to proceed?

## Investigação de opsoclonus: como proceder?

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A 4-month-old child presented with abnormal eye movements for 1 week and muscle twitching. Cerebrospinal fluid (CSF) analysis revealed increased cellularity and positive bacterioscopic test and negative culture results. Other complementary exam results were negative. The patient was diagnosed with parainfectious Kinsbourne syndrome (or opsoclonus-myoclonus-ataxia syndrome). Ceftriaxone and intravenous immunoglobulin administration resulted in gradual improvement.

Parainfectious Kinsbourne syndrome is a rare disorder characterized by opsoclonus (involuntary anarchic conjugate multidirectional binocular movements) and cerebellar ataxia, sometimes with a myoclonic component. The etiology varies and includes idiopa-

thic or parainfectious (viral and bacterial) causes and metabolic, toxic, or paraneoplastic syndromes. Neuroblastoma is the primary consideration in children<sup>1,2</sup>.

In adults, parainfectious Kinsbourne syndrome may continue to represent paraneoplastic disease associated with cancer (lung, breast, and ovary), brainstem hemorrhage, or multiple sclerosis.

The diagnostic investigation should include a search for tumors, paraneoplastic syndrome, and infections by performing complete ophthalmological and neurological examinations. Magnetic resonance imaging or computed tomography of the head, thorax, and abdomen; full-body positron emission tomography; CSF examination; and urinary catecholamine measurements may be necessary<sup>3</sup>.



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**Received on:** Apr 9, 2023. **Accepted on:** June 2, 2023.

**Funding:** No specific financial support was available for this study. **Conflict of interest:** None of the authors have any potential conflict of interest to disclose.

**How to cite:** Battistella R. Opsoclonus investigation: How to proceed?. eOftalmo. 2023;9(2):97-8.

**DOI:** [10.17545/eOftalmo/2023.0028](https://doi.org/10.17545/eOftalmo/2023.0028)

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Treatment is directed at the underlying etiology. Immunomodulation with corticosteroids, plasmapheresis, or intravenous immunoglobulin can help improve the clinical condition<sup>1-3</sup>.

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