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Neurological Sciences

ISSN 1590-1874

Neurol Sci

DOI 10.1007/s10072-020-04779-7



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Reply to “Axonal” form of Guillain-Barré syndrome in a patient receiving oxaliplatin-based chemotherapy

François Wang¹ · Maelle Tyberghein¹Received: 27 July 2020 / Accepted: 26 September 2020
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We thank Jia and Zhang for their interesting comments [2] on our recent letter to the Editor [4]. We agree with most of these comments, but we wish to provide the clarifications essential to the understanding of this clinical case.

As a reminder, our patient suffered persistent diarrhea followed 1 week later by an acute increase of distal dysesthesia associated by weakness of the four limbs and electrodiagnostic (EDX) was in accordance with a motor and inexcitable form of Guillain-Barré syndrome (GBS). Sensory nervous conduction in the upper and lower limbs was within normal limits in velocity and amplitude.

Three days after this acute onset, at emergency room consultation, tendon reflexes were abolished at the four limbs, distal paresis was detected at upper limbs (asymmetrically, right more than left side) and at lower limbs (symmetrically) with gait ataxia (the patient could still walk unaided) and a hypopallesthesia in the four limbs; kalemia was 4.14 mmol/l; at this moment, there was no raise of protein in the cerebrospinal fluid. As previously indicated, the patient soon started treatment with intravenous immunoglobulin (0.2 g/kg/day for 5 days) and showed in 3 weeks remarkable recovery with significant weakness improvement [4].

Ulnar conduction block, below elbow, was 75% at day 5, 46% at day 11, and 23% at day 28 from the disease onset, like conduction blocks mimicking demyelination reported in axonal variants of GBS [3]. Onconeural antibodies were negative. Serum sample

was collected the day before the beginning of IVIg administration; therefore, it was a true negative result [1].

Finally, Jia and Zhang [2] seem to have missed the following information “Anti-CJ antibodies were tardively tested and were positive. By comparison with a frozen serum, dating from early GBS, it was proven that the CJ infection was acute” [4].

Taken together, acute onset of weakness of four limbs 1 week after persistent diarrhea, EDX suggestive of a motor inexcitable form of GBS with conduction block in the very early phase of disease, with a significant weakness improvement 3 weeks after IVIg treatment and an acute CJ infection as indicated by 2 successive anti-CJ antibodies detection are, from our point of view, highly suggestive of an axonal form of GBS.

Compliance with ethical standards

Conflict of interest The authors declare that they have no conflict of interest.

Ethical approval All procedures performed in this study were in accordance with the ethical standards of the institutional and/or national research committee and with the 1964 Helsinki declaration and its later amendments or comparable ethical standards.

Informed consent Informed consent was obtained from the participant included in the paper.

References

1. Grüter T, Ott A, Meyer W, Jarius S, Kinner M, Motte J, Pitarokoilis K, Gold R, Komorowski L, Ayzenberg I (2020) Effects of IVIg treatment on autoantibody testing in neurological patients: marked reduction in sensitivity but reliable specificity. *J Neurol* 267:715–720
2. Jia L, Zhang H (2020) Axonal form of Guillain-Barré syndrome in a patient receiving oxaliplatin-based chemotherapy. *Neurol Sci*. <https://doi.org/10.1007/s10072-020-04560-w>
3. Kuwabara S, Ogawara K, Misawa S, Koga M, Mori M, Hiraga A, Kanesaka T, Hattori T, Yuki N (2004) Does *Campylobacter jejuni*

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infection elicit “demyelinating” Guillain-Barre syndrome? *Neurology* 63:529–533

4. Tyberghein M, Milants C, Bouquiaux O, Wang F (2020) Axonal form of Guillain-Barré syndrome in a patient receiving oxaliplatin-based chemotherapy. *Neurol Sci* 41:1611–1613. <https://doi.org/10.1007/s10072-019-04199-2>

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