Teaching Video NeuroImage: “Weighing” in on an Unusual Tremor

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A 73-year-old right-handed man with hypertension, hypercholesterolemia, renal insufficiency, and cyclothymic disorder presented with 1 year of insidious onset tremor in his right hand when carrying his briefcase. Psychotropic drugs included bupropion and lamotrigine. He was neurologically intact except for a very low amplitude bilateral kinetic tremor (L > R) and a much larger amplitude right hand task-specific tremor (video 1) characterized by EMG (figure).

The phenomenology is classic for a weight-holding or “shopping bag tremor” first described in 1995.1 It is difficult to categorize based on the consensus statement for tremor classification.2 It could be considered a variant of isometric tremor, essential tremor, or task-specific tremor with different underlying etiologies. It is typically an asymmetric, progressive kinetic tremor that appears exclusively (or is more evident) when holding a weight, in contrast to classical essential tremor, which reduces in amplitude with weight-bearing.

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No targeted funding reported.

Surface EMG recording of 6-Hz tremor in the right flexor carpi radialis and extensor carpi radialis muscles while holding a bag (weight ~2.3 kg), with the hand in a “semi-opened” position. There was synchronous activation of agonist-antagonist muscles, which was specific to carrying weight in the right arm.

Figure Electrophysiologic Studies

Right flexor carpi radialis

Right extensor carpi radialis

500 μV

500 ms

More Online
Teaching slides
http://links.lww.com/WNL/B398

*These authors participated equally as co-senior authors.
Disclosure
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Appendix

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References
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