

SEVERITY ASSESSMENT OF CARPAL TUNNEL SYNDROME

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Introduction: Severity of Carpal Tunnel Syndrome (CTS) is an important factor in determining appropriate treatment of the condition. The American Association of Neuromuscular & Electrodiagnostic Medicine (AANEM) published guidelines for electrophysiologic severity in Minimonograph #26.

Objectives: To examine indicators of CTS severity utilized by board-certified electromyographers in clinical practice.

Methods: Retrospective review of testing of 530 hands in 2004 with CTS from One Call Medical's Neurodiagnostic Network was done. Severity ratings were recorded when conclusions included severity indications. CTS records without severity ratings were excluded. Each report was reviewed for correlation to Minimonograph #26 severity gradings.

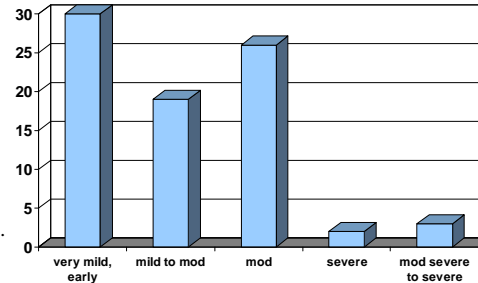
Results: Categories of severity utilized by practitioners included: borderline, minimum, subtle, extremely mild, mild, possible, early, mild to moderate, moderate, moderately severe, moderate to severe, severe and advanced. Of the 530 hands studied, 293 had documentation of severity consistent with the indicators in the Minimonograph. Findings of the 237 reports inconsistent with the grading system showed discrepancies in all categories. For example, the 43 reports given severe ratings, when graded using the Minimonograph ratings, revealed 2 as mild, 41 as moderate, and none as severe. The 13 reports the Minimonograph criteria would have rated severe were instead rated by the practitioners as moderate (5), moderate to severe (3), moderately severe (3), and advanced (2). No source references for severity were documented by any of the 171 physician electromyographers, many of whom were board-certified by AANEM.

Conclusions: Results indicate a lack of utilization of severity documentation and non-uniformity in classifications, suggesting a need for increased education and reporting standardization.

Electromyographers Classifications Inconsistent with AANEM Minimonograph #26 Gradings for CTS

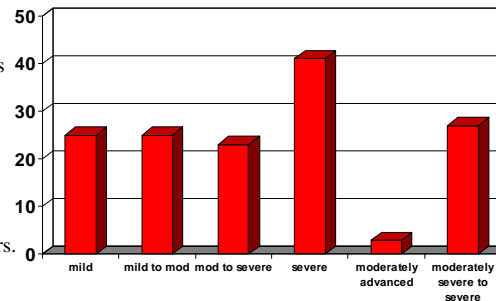
MILD

Data for 80 hands satisfying Minimonograph classification of mild. Graph illustrates actual grading given by electromyographers.



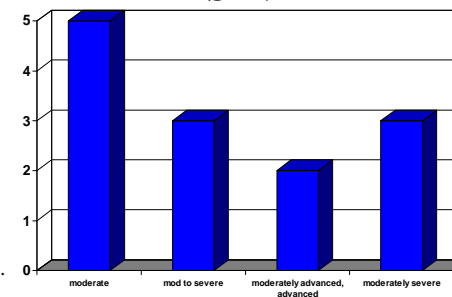
MODERATE

Data for 144 hands satisfying Minimonograph classification of moderate. Graph illustrates actual grading given by electromyographers.



SEVERE

Data for 13 hands satisfying Minimonograph classification of severe. Graph illustrates actual grading given by electromyographers.

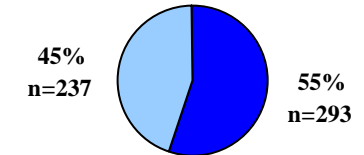


Minimonograph Gradings

- Mild
- Moderate
- Severe

Severity Documentation

- Consistent with minimonograph
- Inconsistent with minimonograph



Additional Gradings Utilized by Electromyographers

- borderline
- minimum
- subtle
- extremely mild
- possible
- early
- very mild
- trace
- borderline to mild
- mild to moderate
- moderate to severe
- slight to moderate severe
- moderately severe
- advanced, moderately advanced
- moderately severe to severe