

# ` Quick Review of Model System Research

## Assessing the Ability of Comorbidity Indexes

## to Capture Comorbid Disease in the

## Inpatient Rehabilitation Spinal Cord Injury Population

### What is the study about?

### This study aims to examine whether commonly used comorbidity (i.e., other medical conditions) measures identify comorbidities in the acute traumatic and non traumatic spinal cord injury (SCI) inpatient rehabilitation population. Individuals with SCI often have comorbidities that affect health outcomes. Currently, no comorbidity measure is considered the standard for risk adjustment. Measures vary in what is included, such as: conditions, measurement period of these conditions, and how they are combined into a measure.

### What did the study find?

This study found that 3 commonly used comorbidity measures (Deyo-Charlson, Elixhauser and CME Comorbidity Tiers) do not capture the extent of comorbid disease in the SCI rehabilitation population. Findings also highlight the breadth of comorbid conditions in SCI and the limitations of existing comorbidity measures.

### Who participated in the study?

Adult individuals with traumatic and nontraumatic SCI (n=66,235) who were discharged from 833 inpatient rehabilitation facilities.

### How was the study conducted?

This study was a retrospective cross-sectional study using data from the Uniform Data System for Medical Rehabilitation. The researchers identified all the diagnoses the individuals had listed in medical records and compared them with the comorbidity scores.

### How can people use the results?

### Individuals with SCI and their families can use the results of this study to be informed that there are standard measures of comorbidities but they do not always capture all the comorbidities in people with SCI. Practitioners can use these results to develop studies to create appropriate comorbidity metrics are most relevant to the SCI population. This could help guide targeted comorbidity treatments for this gorup of patients.

### Reference

Huang, D., Siddiqui, S., Slocum, C.S., Goldstein, R., Zafonte, R.D., & Schneider, J.C. (2020). Assessing the ability of comorbidity indexes to capture comorbid disease in the inpatient rehabilitation spinal cord injury population. *Archives of Physical Medicine and Rehabilitation*. doi: <https://doi.org/10.1016/j.apmr.2020.04.025>

**Disclaimer**

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