

**Table 7.1** Grading Criteria for Gravity-Resisted Muscle Strength

Medical Research Council	Daniels and Worthingham	Description
5	Normal	Patient completes ROM against gravity and against maximal resistance
4+		Patient completes ROM against gravity and against nearly maximal resistance
4	Good	Patient completes ROM against gravity and against moderate resistance
4–		Patient completes ROM against gravity and against minimal resistance >50% range
3+		Patient completes ROM against gravity, against minimal resistance <50% range
3	Fair	Patient completes ROM against gravity with no manual resistance
3–		Patient does not complete ROM against gravity but does complete more than half the range
2+		Patient initiates ROM against gravity or completes range with gravity minimized against slight resistance
2	Poor	Patient completes ROM with gravity minimized
2–		Patient unable to complete ROM with gravity minimized
1		Muscle contraction can be palpated but there is no joint motion
0	Zero	No palpable contraction or joint motion

Data from Medical Research Council, 1943, *Aids to the investigation of peripheral nerve injuries*, 2nd ed. revised (London: H.M.S.O.); and L. Daniels and C.A. Worthingham, 1980, *Muscle testing*, 4th ed. (London: W.B. Saunders).

From S. Shultz, P. Hougum, and D. Perrin, 2016. *Examination of musculoskeletal injuries*, 4th ed. (Champaign, IL: Human Kinetics).