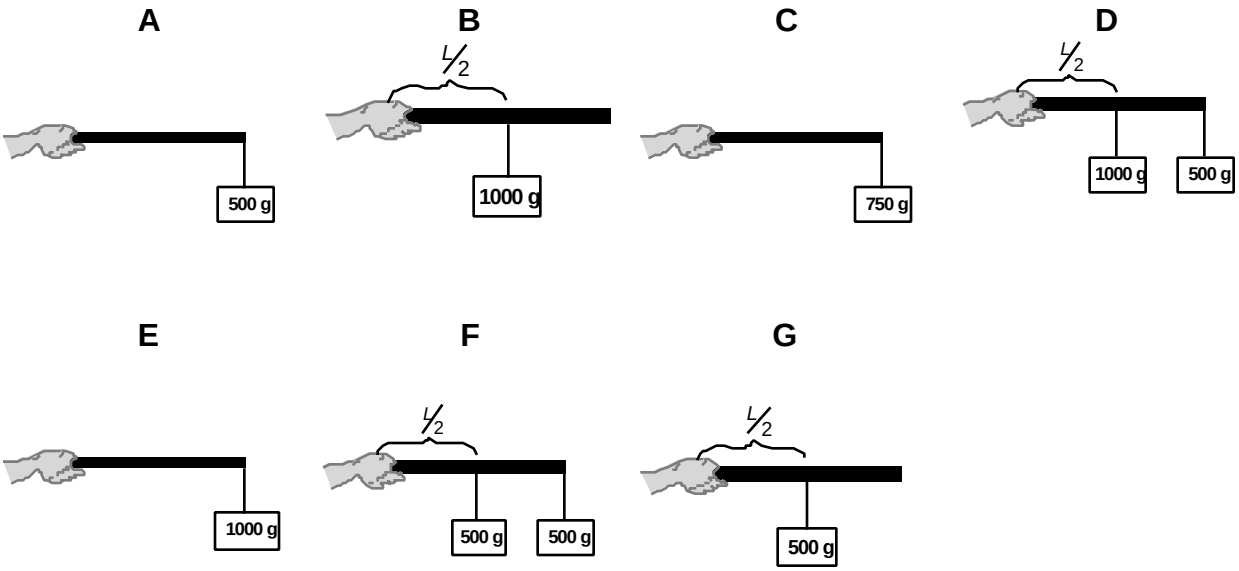
Statics—Difficult to Hold II [96]

Shown below are seven situations where a student is holding a meter stick straight out horizontally. All of the meter sticks are identical, but the number, mass, and locations (either at the 50 cm mark or at the other end of the meter stick from the student) of the objects hung on the sticks vary. The specific values and locations are given in each figure.

Rank these situations, from greatest to least, on the basis of how difficult it would be for the student to keep the meter stick from rotating. That is, put first the situation where it would be hardest to hold the meter stick horizontal and put last the situation where it would be easiest to hold it horizontal.



Hardest 1_____ 2_____ 3_____ 4_____ 5_____ 6_____ 7_____ Easiest

Or, it would be equally difficult to hold all seven of these meter sticks as shown. _____

Please carefully explain your reasoning.

How sure were you of your ranking? (circle one)

Basically Guessed				Sure				Very Sure	
1	2	3	4	5	6	7	8	9	10

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