

The WAGER, Vol. 2(28) - Screening for pathological gambling: A 2-question test

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Short screening instruments for identifying pathological gambling can be useful in clinical settings where clinicians have limited time and often need to collect a variety of different data from each patient. From a research perspective, a shorter instrument that is valid and reliable can measure the same construct (e.g., pathological gambling) as a longer instrument in a more efficient manner. Recently, Johnson & colleagues* developed a 2-question version of the DSM-IV criteria for screening pathological gambling. Their research goal was to assess the minimum number of items from a 12-item questionnaire based on the DSM-IV that would differentiate dependably between pathological gamblers and nonproblem-gambling controls. The sample for this study was 191 male pathological gamblers who were members of Gamblers Anonymous and 171 male nonproblem-gambling controls who were employees at the Department of Veterans Affairs. The two questions that consistently differentiated between pathological gamblers and nonproblem-gambling controls in logistic regressions were 1) have you ever felt the need to bet more and more money?; and 2) have you ever had to lie to people important to you about how much you gambled? Answering yes to one or both of these questions classifies the respondent as a pathological gambler on the 2-question test. For this study, using this sample, the sensitivity of the 2-question lie/bet survey (the proportion of pathological gamblers who test positive) is .99. The specificity (the proportion of non-problem gamblers who test negative) of this test in this study is .91. Although the sensitivity and specificity of this test is high within this sample, the test will not be as effective in accurately screening for pathological gambling among the general population. Sensitivity and specificity influence the predictive value of a test; however, so does the baseline rate of the disorder being screened². Pathological gambling is a low base rate disorder (< 10% in the general adult population). This test, like most gambling screens, would therefore not do very well in classifying as “positive” those who were pathological gamblers, but would do very well in classifying as “negative” those who were not pathological gamblers, since most people are not disordered gamblers.

	<u>Disease State</u>	
	Pathological Gamblers	Controls
<u>2-item Outcome</u>		
Positive	True Positive: 190	False Positive: 16
Negative	False Negative: 1	True Negative: 155

Source: *Johnson, E.E., Hamer, R., Nora, R.M., Tan, B., Eisenstein, N., & Engelhart, C. (1997). The lie/bet questionnaire for screening pathological gamblers. *Psychological Reports*, 80, 83-88; 2Glaros, A.G., & Kline, R.B. (1988). Understanding the accuracy of tests with cutting scores: The sensitivity, specificity, and predictive value model. *Journal of Clinical Psychology*, 44(6), 1013-1023.

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