

Instruments That Assess for Current Misuse or Aberrant Behavior

Pain Medication Questionnaire (PMQ)

The PMQ is a 26-item self-report questionnaire designed to assess the risk of opioid misuse in chronic pain patients.(29,30) Each question is answered using a 5-point Likert format ranging from “disagree” to “agree,” and subsequently, numerical values ranging from 0 to 4 are assigned to these responses. Adams et al. (30) found that higher PMQ scores were associated with a history of substance abuse, higher levels of psychosocial distress, and poorer functioning in a cohort of 184 patients evaluated at an interdisciplinary pain treatment center. When the test was administered to 19 patients at 2 time points, approximately 30 minutes apart, the test-retest reliability is significant (Pearson r coefficient = 0.85). For the entire cohort, internal consistency of the PMQ was acceptable (Cronbach’s alpha coefficient of 0.73). Holmes et al. (29) successfully replicated these findings in a cohort of 271 newly evaluated chronic pain patients. Compared with patients in the lowest tertile, those in the highest tertile were 2.6 times more likely to have a history of substance abuse, 3.2 times more likely to request easy refills of prescription medication, and 2.3 times more likely to drop out of treatment. Moreover, patients receiving disability payments and those who were separated or divorced were more likely to score high on the PMQ. Holmes and colleagues (29) also found that PMQ scores decreased significantly with the completion of an interdisciplinary pain management program. Although Adams et al. (30) showed a positive relationship between high PMQ scores and concurrent measures of substance abuse, this scale still requires further development; it needs to be examined for its predictive and incremental validity, and its ideal length needs to be ascertained.

Comment: The PMQ may prove most useful in evaluating patients who are in, or plan to be in, a multidisciplinary pain clinic so that clinicians can maximize patient selection for such programs. The tool is otherwise most useful in gauging the progress of pain patients already taking opioids.

Chabal 5-Point Prescription Opiate Abuse Checklist

This physician-administered checklist evaluates a series of behaviors that suggest or are consistent with prescription opiate abuse rather than relying on answers to specific questions. Patients meeting 3 or more of the following criteria are considered prescription opiate abusers: (a) overwhelming focus on opiate issues; (b) pattern of 3 or more early refills or escalating drug use without acute changes in their medical condition; (c) multiple telephone calls or visits to request additional opiates or early refills; (d) pattern of prescription problems due to lost, spilled, or stolen medications; and (e) supplemental sources of opiates from other providers or illegal sources. Chabal et al. (31) used the checklist to evaluate 403 pain-clinic patients, including 76 patients (19%) who were using opiates for more than 6 months. Of this latter group, 21 patients (28%) met 3 or more criteria for prescription opiate abuse. The interrater reliability of the 5-point checklist was greater than 0.9. Patients with prescription opiate abuse did not

differ from the other chronic opiate users in terms of history of drug or alcohol abuse or in scores on MAST, DAST, or psychosocial testing tools. This 5-point checklist relies on easily observable behaviors in a clinic setting and accurately describes chronic pain patients who are abusing prescription opiates.

Comment: The Chabal scale is a valuable tool to be used to gauge adherence once patients are already on opioid therapy. As such, it joins the Current Opioid Misuse Measure (COMM) and PMQ, but is the only evaluative instrument that is calculated by the clinician. Such a system is valuable for the clinician who is thinking through changes in treatment plans and levels of monitoring. This series of questions might be especially valuable for the pain clinician to put to a referring physician to quantify the degree of nonadherence that has been encountered prior to a pain specialist consultation.

Prescription Drug Use Questionnaire (PDUQ)

The PDUQ is a 42-item yes-or-no measure designed to be used by clinicians in an interview format with chronic pain patients who are suspected of being addicted to their pain medication. Requiring approximately 20 minutes to administer, the tool evaluates the following areas: pain condition, opioid use patterns, social and family factors, family history of pain and substance abuse, patient history of substance abuse, and psychiatric history. Compton et al. (32) evaluated the PDUQ in 52 consecutive opioid-treated chronic pain patients who were referred from a university-based multidisciplinary pain clinic for “problematic narcotic use” or “drug-seeking” behaviors. The majority of subjects were white (92%), female (60%), and currently married (58%) and suffered from more than 1 painful condition (65%). Opioids had been administered for a mean of 54 months. Overall, 20 patients (38.5%) met diagnostic criteria for substance abuse, and 14 patients (26.9%) met diagnostic criteria for substance dependence, whereas the remaining 18 patients (34.6%) did not meet criteria for a substance abuse disorder. Scores were calculated based upon answers to the questionnaire items. Patients with substance abuse disorders had significantly higher scores than those without such disorders; all patients who had scores above 15 also met the defined diagnostic criteria for a substance abuse disorder. After excluding 10 cases with missing data, internal consistency measured by Cronbach’s alpha was 0.79. On logistic regression, responses to 3 specific questions (patient believes he/she is addicted, pattern of increasing analgesic frequency or dose, and preference for specific analgesic or route of administration) were shown to best predict the presence of addictive disease, correctly classifying 93% of the study subjects.

Comment: This interview format tool is a useful and accurate in retrospectively evaluating patients’ nonadherence and the degree to which it corresponds to DSM-IV diagnoses of SUD.

Current Opioid Misuse Measure (COMM)

The COMM is a new 17-item self-report measure designed to identify aberrant drug-related behavior of patients on chronic opioid therapy.(33) The measure was designed to provide a simple, practical method for the continued assessment of current opioid misuse. A 40-item alpha version of the COMM was tested in 227 patients with chronic, noncancer pain. Patients also received the Aberrant Drug Behavior Index (ADBI), which relates positively with opioid medication misuse, and the Marlowe-Crowne social desirability scale. Seventeen items were selected for further study based on good test-retest reliability, a good correlation with ADBI, and a relatively poor correlation with the Marlowe-Crowne Social Desirability scale. (The latter 2 criteria were used to help identify items that were better at revealing true aberrant behavior than capturing socially desirable responses.) For each item, respondents were asked to rate the frequency of a thought or behavior over the last 30 days, ranging from “never” (scored as 0) to “very often” (scored as 4). Questions capture signs and symptoms of drug misuse (e.g., problems with thinking), emotional/psychiatric issues, evidence of lying, appointment patterns (e.g., doctor shopping), and medication misuse/noncompliance (e.g., borrowing pain medications from friends, taking more than the prescribed dose).

In the 227 patients, the correlation of these 17 items with the ADBI was 0.51 and with the Marlowe Crowne was -0.26 . The 1-week test-retest reliability in a subset of the study subjects ($n = 55$) was good (0.86). In 86 individuals tested 3 months later, a Receiver Operating Characteristic (ROC) analysis of the COMM with ADBI yield a high area under the curve of 0.92 (95% CI: 0.86-0.98), suggesting the COMM could accurately detect aberrant behavior relative to the ADBI. A COMM score of 9 had a sensitivity of 77% and a specificity of 73%.(33)

Comment: The COMM is a new measure that is useful in assessing adherence issues in patients already on opioid therapy. Its psychometrics are acceptable and it may prove quite useful in the reassessment of opioid therapy. Further study in more patients is needed, and long-term reliability must be confirmed.