BRIEF REPORTS

Practice Guidelines and Late-Life Depression Assessment in Long-Term Care

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To determine how well nursing home physicians believe they can detect and treat depression, we conducted a national survey, eliciting a 63% response rate. More than 75% of respondents believed they detected and treated depression well. Excellent depression training (vs “good,” “fair,” “poor/none”) was associated with better self-reported recognition (odds ratio [OR] 14.25; 95% confidence interval [CI] 1.81, 111.93) and treatment skills (OR 6.72; 95% CI 1.91, 23.64). Screening tool use predicted greater self-assessed detection (OR 1.89; 95% CI 0.92, 3.87) and treatment competency (OR 2.00; 95% CI 1.14, 3.50). Practice guideline awareness was associated with greater self-reported treatment competency (OR 2.47; 95% CI 1.56, 3.91).

KEY WORDS: depression; primary care; nursing home.
J GEN INTERN MED 1999;14:438-440.

Depression occurs in one third of nursing home residents.^{1,2} Newly admitted nursing home patients experience more functional impairment, have greater hospitalization rates, use more staff resources, and are 1.5 times more likely to die within 12 months of admission.²⁻⁴

Nursing home depression can go unrecognized by the primary care physician. Rovner et al. found that only 14% of patients diagnosed as depressed by psychiatric evaluation were recorded as depressed by primary care physicians.² Other studies have found that only 20% of nursing home patients diagnosed as depressed by psychiatric evaluation received antidepressant treatment.^{4,5} Because nursing home patients often depend on primary care physicians for their treatment,⁶ depression diagnostic and treatment skills are critical.

Most internists agree that diagnosing and treating depression is their responsibility, but only 55% feel confi-

dent diagnosing depression, and 35% are confident prescribing antidepressants.⁷ In contrast, one third of family physicians are unaware of depression practice guidelines, and one fourth use screening tools.⁸

This survey explored the following questions:

1. Do primary care physicians view themselves as competent to detect and treat late-life depression?
2. Do demographic, educational or practice characteristics predict physician self-perceived depression detection or treatment skills?
3. To what extent are physicians aware of and using depression screening tools and depression practice guidelines in nursing home patient care?
4. To what extent is awareness and use of depression screening tools and depression practice guidelines associated with physicians' self-perceived competence in treating depression?

METHODS

One thousand primary care physicians were randomly selected from the American Medical Directors Association.⁹ Retired physicians, specialists, and non-care providers were excluded.

The study was administered as a mailed, confidential survey during January through May of 1996. Nonresponders were mailed the survey twice more at 6-week intervals.

The 29-item survey included items identified as potentially useful from previous research.^{7,8,10} Using a 4-point Likert scale, physicians indicated whether they agreed with statements about the adequacy of their training in late-life depression, their skill in depression recognition and treatment, the availability of community treatment resources, the availability of nursing home psychiatric consultation, their use of a screening tool, and their use of depression practice guidelines.

Chi-square tests examined relations between the main outcomes of the study and potential predictors. We collapsed the Likert scale into a dichotomous variable (“agree” vs “disagree”), and used logistic regression to determine whether independent variables predicted a positive

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response. Predictor variables with a *p* value below .15 on univariate analyses were entered into the multivariate models. Several models were constructed using the criterion that variables to be included must substantially improve predictive power, based on the likelihood ratio test. For the final model, adjusted odds ratios (ORs) and their 95% confidence intervals (CIs) were obtained.¹¹ SAS software was used for statistical analyses (SAS/STAT User's Guide, version 6, 4th ed. SAS Institute Inc., Cary, NC).

RESULTS

Of the 640 respondents, exclusion criteria eliminated 25 respondents, leaving a response rate of 63%. Mean (SD) age was 51.2 (11.6) years (range, 30–89). Most were men (80%). More physicians were medical doctors (84% males and 62% females), than osteopaths. In comparison with male respondents, more women were internists (59% vs 37%), and significantly more (60% vs 51%) held a dual practice role (attending physician or administrator.)

All respondents cared for depressed nursing home patients (Table 1). Although more than half (59.9%) of re-

spondents rated their training as fair or better, the majority agreed or strongly agreed that they were able to recognize (88.5%) and treat (79.1%) depression.

The unadjusted values in Table 2 described the univariate results. Self-assessed skill in recognizing depression was associated with perceived adequacy of training (OR 18.9), a medical degree (OR 2.5), a lower percentage of depressed patients (OR 3.7), awareness of practice guidelines, and community size.

The adjusted values in Table 2 describe the multivariate results. Adequacy of training was the most significant predictor of physicians' ability to recognize late-life depression (OR 14.25; 95% CI 1.81, 111.93.) Physicians with small nursing home practices were significantly more likely to recognize depression compared with physicians with large practices (OR 2.72; 95% CI 1.21, 6.13.) Medical doctors were significantly more likely than osteopathic doctors to recognize depression. Rural and small-town physicians were less likely to recognize depression than their urban counterparts. Physicians' ratings of the usefulness of depression screening tools approached, but did not attain, significance in predicting detection skills (*p* = .07.)

Most predictors of physicians' confidence in recognizing depression also emerged as predictors of treatment confidence. Common predictors include adequacy of training (OR 6.72), practice community size, usefulness of screening tools, and an MD degree. Physicians' awareness of practice guidelines and practice years predicted treatment skills (OR 2.47).

Table 1. Nursing Home Physicians' Self-Described Training, Patient Population, and Practice Description (n = 615)

Characteristic	n	%
Adequacy of training		
Excellent	67	11.0
Good	177	29.2
Fair	227	37.4
Poor	112	18.5
None	24	4.0
Patients in nursing homes, %		
0–15	349	56.7
16–29	68	11.1
30–59	78	12.7
60+	120	19.5
Depressed patients in nursing homes, %		
0–15	199	32.4
16–29	153	24.9
30–59	189	30.7
60+	74	12.0
Able to recognize depression		
Strongly agree	95	15.5
Agree	446	73.0
Disagree	64	10.5
Strongly disagree	6	1.0
Able to treat depression		
Strongly agree	79	12.9
Agree	406	66.2
Disagree	120	19.6
Strongly disagree	8	1.3
Able to prescribe antidepressants		
Strongly agree	127	20.7
Agree	424	69.2
Disagree	55	9.0
Strongly disagree	8	1.3

DISCUSSION

Our results suggest that training in depression recognition and treatment may be critical for physicians to consider themselves skilled in managing depression. Our results also suggest that training may be especially helpful for targeted physician groups, such as rural physicians, doctors with large nursing home practices, and osteopathic physicians.

The development of evidence-based practice guidelines for managing depression¹² may reduce variability in physicians' screening, diagnostic, and treatment patterns. Although practice guidelines and screening tools^{13,14} have been criticized for not changing case-finding and treatment,¹⁵ this study showed that physicians using practice guidelines and screening tools had more confidence in their detection and treatment abilities.

Further focused educational efforts might be required to improve physicians' confidence and skills in caring for depression. This education might include information about the variability in late-life depression, age-appropriate screening tools, and the appropriate use of practice guidelines in the nursing home. Using these tools, primary care physicians treating depression in the nursing home might be able to test their clinical judgments empirically against standard professional benchmarks.

Table 2. Odds Ratios and 95% Confidence Intervals for Significant Predictors of Physicians' Self-reported Skill in Recognizing Depression

Characteristic	Unadjusted Odds Ratio (95% CI)	Adjusted Odds Ratio (95% CI)
Adequacy of training (ref. poor/none)		
Excellent	18.86 (2.51, 141.59)	14.25 (1.81, 111.93)
Good	6.94 (2.94, 16.36)	6.11 (2.52, 15.14)
Fair	2.10 (1.18, 3.71)	2.18 (1.17, 4.05)
Depressed patients in nursing homes (ref. 60+%), %		
0–15	3.74 (1.97, 7.09)	2.72 (1.21, 6.13)
16–29	0.98 (0.50, 1.91)	0.96 (0.47, 1.97)
30–59	0.79 (0.33, 1.90)	0.89 (0.34, 2.31)
Find screening tools useful, "agree" (ref. "disagree")	2.26 (1.20, 4.23)	1.89 (0.92, 3.87)
Practice community (ref. large city)		
Rural	0.20 (0.08, 0.51)	0.41 (0.15, 1.15)
Small town	0.24 (0.10, 0.54)	0.36 (0.15, 0.85)
Small city	0.40 (0.16, 1.00)	0.83 (0.30, 2.32)
Medium city	0.34 (0.13, 0.90)	0.56 (0.20, 1.56)
Medical degree of MD (ref. DO)	2.51 (1.47, 4.29)	2.33 (1.23, 4.40)

This work was supported by a Blue Cross Blue Shield of Michigan Foundation Grant.

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