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Patient Activation and Mental Health Care Experiences Among Women Veterans

Rachel Kimerling^{1,2}, Joanne Pavao¹, and Ava Wong²

Rachel Kimerling: rachel.kimerling@va.gov; Joanne Pavao: joanne.pavao@va.gov; Ava Wong: ava.wong@va.gov

¹National Center for PTSD, VA Palo Alto Health Care System, 795 Willow Road, PTSD-324, Menlo Park, CA 94025, USA

²Center for Innovation to Implementation, VA Palo Alto Health Care System, 795 Willow Road (152 MPD), Menlo Park, CA 94025, USA

Abstract

We utilized a nationally representative survey of women veteran primary care users to examine associations between patient activation and mental health care experiences. A dose–response relationship was observed, with odds of high quality ratings significantly greater at each successive level of patient activation. Higher activation levels were also significantly associated with preference concordant care for gender-related preferences (use of female providers, women-only settings, and women-only groups as often as desired). Results add to the growing literature documenting better health care experiences among more activated patients, and suggest that patient activation may play an important role in promoting engagement with mental health care.

Keywords

Patient activation; Women; Mental health

Introduction

Patient-centered care is responsive to patient preferences, needs, and values (Institute of Medicine 2001), and has emerged as a strategic priority across the Veterans Health Administration (VHA) system, articulated as “personalized, proactive, and patient-driven” health care that is “customized according to patient needs, values, and personal desire for control” (Veterans Health Administration 2014). Patient engagement forms the foundation for this approach. The construct of patient engagement has been operationalized in terms of a variety of behaviors such as asking questions in the health care encounter, expressing preferences, negotiating treatment plans, seeking health information, adhering to medications, and self-managing chronic conditions (Gruman et al. 2010). Patients differ in their aptitude and motivation to perform these engagement behaviors, conceptualized as their level of patient activation (Hibbard and Greene 2013). Patient activation is commonly measured using the Patient Activation Measure (PAM) (Hibbard et al. 2004, 2005). The

PAM classifies respondents into 4 developmental stages of activation, where lower levels of activation (level 1) characterize individuals that are less likely to self-manage, seek health information, or believe that taking an active role in health care is beneficial. Intermediate levels of activation (levels 2 and 3) characterize individuals that may have some knowledge and motivation to engage with care, but require help in setting and achieving health-related goals, and building confidence in the ability to share decisions and manage their health and health care. Highly activated individuals (level 4) can more easily adopt new health behaviors, share decisions with providers, and may only require guidance maintaining healthy behaviors under stress (Hibbard et al. 2007, 2009). More highly activated patients tend to report more positive health care experiences (Heller et al. 2009; Knutsen et al. 2014) and better communication with providers (Alexander et al. 2011; Cortes et al. 2009; Wong et al. 2011). Even when receiving care from the same provider in the same setting, more activated patients report significantly better communication and care coordination (Green et al. 2013). These data suggest that more activated patients may be better able to elicit care that meets their needs.

Among individuals receiving mental health care, patient activation is associated with better self-management (Green et al. 2010; Salyers et al. 2009), more positive recovery attitudes (Green et al. 2010; Kukla et al. 2013) and better response to treatment (Sacks et al. 2014). Similarly, shared decisions during mental health visits appear more likely when patients take a more active role (Fukui et al. 2014). Interventions have demonstrated effectiveness at increasing activation levels among mental health services users, and concomitant increases in self-management, treatment attendance (Alegria et al. 2014) and retention (Alegria et al. 2008). In a mixed-methods study with VHA mental health service users with chronic mental illness, Salyers et al. (2013) articulated potential mechanisms in the relationship of activation to mental health engagement and outcomes by identifying themes related to activation level as identified by the mental health version of the PAM (Green et al. 2010). More highly activated patients were more likely to acknowledge and accept diagnoses, describe feeling as if they could control or cope with symptoms, and describe a proactive, mutually collaborative relationship with providers. Mental health consumers that are more highly activated may therefore report better mental health care experiences. Taken together, these studies suggest that the goal-oriented, collaborative approach observed among more activated consumers suggests that patient activation may define a set of skills that help elicit more productive, patient-centered mental health care.

The patient-centered approach is important in addressing the gender-related mental health needs of women receiving VHA mental health care. Women were only 6.1 % of all veteran users in 2005, increasing to 7.7 % in 2012, and this proportion is expected to continue to rise (National Center for Veterans Analysis and Statistics 2014). As compared to men, women VHA users have higher rates of mental health conditions and comorbid chronic health conditions (Frayne et al. 2013). While few studies have examined mental health experiences specifically, examination of gender disparities in VHA care experiences indicate few differences in outpatient care experiences after case mix adjustment (Wright et al. 2006). Some disparities exist for inpatient care, where women report poorer experiences as compared to men for care experiences that may be sensitive to patient activation, such as shared decision making, communication about medications, and communication of

discharge information (Hausmann et al. 2014). Women veterans report distinct gender-related preferences regarding mental health services (Kimerling et al. 2014), such as preferences for female providers, women-only groups, or designated women's treatment settings. These preferences vary as a function of demographic and service characteristics, the conditions being treated, and comorbidities. This variation suggests the need for an individualized, patient-centered approach. When these gender related preferences are met, women report significantly better access, with an increased likelihood of reporting that mental health care met their needs (Kimerling et al. 2015). The organization and availability of specialized mental health services for women varies greatly across VHA (MacGregor et al. 2011; Oishi et al. 2011), and given the small numbers of women in some facilities, a full range of designated women's clinics, groups, or other services within specialty mental health may not always be feasible or available. If more activated women are better able to express gender-related preferences to providers and engage shared decision making about treatment options that best address these preferences, patient activation may play an important role helping women obtain high quality, preference-concordant care, even when the full range of specialty women's services are not universally available.

In this study we examined the role of patient activation in patient-centered mental health care by assessing the relationship of activation level to mental health care experiences and preference-concordant mental health care. We hypothesized that higher activation levels would be associated with more positive experiences of VHA mental health care, such as ratings of overall quality and ease of getting needed care. We also hypothesized that higher activation levels would be associated with care consistent with gender-related preferences, such as access to women's mental health settings, female providers, and reports of gender-related comfort in specialty mental health settings. We predicted that these associations would remain, even after accounting for individual characteristics demonstrated to impact ratings of behavioral health care experiences, such as race/ethnicity, education, and disability (Eselius et al. 2008).

Methods

Design and Sample

The sample is drawn from the Women's Overall Mental Health Assessment of Needs (WOMAN) Survey, a cross-sectional telephone survey of a population-based stratified random sample of 6287 women veterans (84 % participation rate) who used VHA primary care between October 1, 2010 and September 30, 2011 (Kimerling et al. 2015). This study includes all participants who reported past-year utilization of inpatient or outpatient mental health services at a VHA medical center, outpatient clinic, or Vet Center (n = 2466). This study was approved by the Stanford University Institutional Review Board.

Measures

Patient activation was assessed using the 13-item Patient Activation Measure (PAM-13), (Hibbard et al. 2007, 2005). Items were rated on a 4-point Likert scale ranging from 1 (strongly agree) to 4 (strongly disagree). The measure yields an activation score from 0

(least activated) to 100 (most activated), which is transformed into an ordinal indicator of 4 levels of activation ranging from level 1 (least activated) to level 4 (most activated).

Mental health care experiences were assessed in relation to VHA mental health services received in the year prior to the survey. These items were rated in five point Likert scales and then re-coded to obtain indicators of high ratings of care. Overall quality was queried with the item “Overall, how would you rate the quality of the VA mental health care you received in the past year?” with high ratings coded for responses of very good or excellent. Ease of getting needed care was queried with the item, “How difficult was it for you to get the VA mental health care you wanted in the past year?” with high ratings coded for easy or very easy. Gender-related comfort was queried with the item, “Thinking about your mental health treatment settings, how often did you feel out of place, uncomfortable, or uneasy because you are a woman?” with high ratings coded for never or some of the time. Gender related preferences were queried by asking respondents whether they were able to receive mental health care with preferred characteristics as often as she wished. These characteristics included seeing female providers, participating in women-only group treatments, and receiving care in settings specifically for women. All ratings allowed for response options to indicate that these characteristics were not preferred, and high ratings were coded for responses of always and most of the time.

Demographic characteristics of age, race, ethnicity, and highest level of education were obtained from the survey. Priority group (as a proxy for disability) and rural residence were obtained from VA Medical SAS Outpatient files and the Planning Systems Support Group enrollment files (Phibbs et al. 2013; VA Information Resource Center 2011). Priority group was collapsed into three groups, service connected, income eligible/disabled, and co-pay. Dual VA and non-VA mental health care use was obtained from detailed self-report questions on all past-year mental health care (inpatient, outpatient, and medication), assessing VA and non-VA care separately (Kimerling et al. 2015).

Statistical Analysis

Data were weighted in analysis for design characteristics, nonresponse and post-stratification to represent the population of VHA female primary care users. We examined associations of veteran characteristics and activation level using χ^2 statistics, and used nonparametric tests for trends (Cuzick 1985) to examine proportions of high ratings for care experiences at each level of patient activation. We then used logistic regressions to model care experiences as a function of patient activation, adjusting for veteran characteristics and for clustering within VHA facilities. All analyses were conducted using STATA SE version 12 (StataCorp. 2007).

Results

Table 1 displays veteran characteristics by patient activation level. Activation level was significantly associated with race [χ^2 (6) = 137.3, $p < .0001$] and education [χ^2 (6) = 49.7, $p < .01$] (Table 1). Proportions of women reporting high ratings for care experiences at each activation level are displayed in Table 2. Results demonstrated a significant linear trend where successively higher activation levels were associated with a greater probability of

positive experiences for all domains. Adjusted associations between patient activation level and mental health care experiences are shown in Table 3. For all domains, odds of high ratings were significantly greater at the highest level of activation (level 4) as compared to the lowest (level 1). Trend effects where each higher level of patient activation demonstrated significantly greater effect sizes persisted for ratings of overall quality of mental health care. For ease of getting needed care, gender-related comfort, and access to female providers as often as wished, odds of high ratings were significantly higher at all levels as compared to level 1 (lowest level), and effects significantly stronger at level 4. For use of women-only groups, effects for patient activation were significant only at the highest level of activation (level 4). For women-only settings, activation was associated with high ratings for levels 3 and 4.

Discussion

This study found that higher patient activation levels were associated with greater likelihood of high ratings for mental health care experiences among women veterans using VHA services. To our knowledge, this is the first study to examine patient activation in relation to mental health care experiences, and to examine patient activation as it relates to quality ratings for VHA care experiences. This study adds to the growing literature documenting better health care experiences among more activated patients (Greene et al. 2013; Wong et al. 2011), hypothesized to result from more productive and collaborative interactions with providers (Alexander et al. 2011), and better skills to maneuver the complexities of a health care system (Hibbard and Cunningham, 2008). Results demonstrated a robust dose-response relationship where each successive activation level was associated with increasing effect sizes on high ratings for overall quality of mental health care. There is some data that suggests that patient ratings of quality are associated with objective indicators of quality of mental health care (Edlund et al. 2003), though additional research is needed to examine this association for VHA. Patient quality ratings are also important indicators of patient satisfaction and are widely used to monitor health care quality. These results suggest that interventions that can developmentally move veterans to even one higher level of activation may be associated with substantial quality improvement.

Higher levels of patient activation were also associated with greater odds of high mental health ratings for getting needed care and gender-related comfort. These measures reflect a veteran's ability to negotiate health care systems to access the care they need and want in an environment where they can feel comfortable and safe. These factors may be especially important for engagement with mental health care, and broadly reflect a patient centered care environment (National Committee for Quality Assurance 2013). Findings for gender-related comfort may be especially important, as prior work has documented concerns about comfort and safety in VHA care environments among women veterans (Mengeling et al. 2011), and such concerns are prevalent among VHA users who seek mental health treatment outside VHA (Kimerling et al. 2015). More activated women may be more likely to express concerns to providers or seek alternative treatment arrangements within the system that better meets their needs.

Highly activated women were significantly more likely to receive preference concordant mental health care as compared to women at the lowest activation level. More activated women were more likely to see female providers as often as desired, participate in women-only group treatment as often as desired, and receive care in designated settings for women as often as desired. Effects for participation in women-only group treatments demonstrated effects only at the highest level of activation, which may be due to the large proportion of women who did not desire group treatment as part of their mental health services. These findings are consistent with qualitative data observing that more active or activated mental health users are more likely to engage in shared decisions and collaborative relationships with providers (Fukui et al. 2014; Salyers et al. 2009). Our findings extend the potential applications of interventions to promote patient activation as ways to facilitate patient centered care. More activated health care users appear to be more likely to have the skills, confidence, and motivation to express preferences to providers and negotiate systems of care in order to obtain care that is consistent with their needs and values. Patient activation may therefore have utility for quality improvement efforts targeted to VHA women's mental health services. Interventions to promote activation demonstrate promising results among under-represented racial and ethnic groups in mental health settings (Alegria et al. 2002, 2014), and may show similar promise with respect to women's relative minority status in VHA mental health settings.

Several limitations must be considered in the interpretation of these results. Survey non-response was addressed through weighting, and mitigated by our high participation rate, but differences in unmeasured variables could have affected results. We identified mental health users from a VHA primary care population to examine VHA mental health care experiences distinct from gender-related perceptions of VHA care that differ among VHA users and non-users identified elsewhere (Mengeling et al. 2011; Washington et al. 2011). These results cannot be generalized to women veteran's mental health care experiences outside of VHA, but do provide important information on how to meet the needs of women currently using VHA services.

Our results should also be interpreted in light of our focus only on individual veteran factors associated with mental health care experiences. Veteran ratings of health care experiences for both inpatient and outpatient care vary across facilities (Hausmann et al. 2014; Hausmann et al. 2013), and our study did not focus on organizational or structural characteristics that impact these experiences. The care environment could potentially exert positive effects on patient activation or preference-concordant care through widespread and visible availability of desired services. For example, even among the most activated women, larger proportions reported high ratings for the availability of female providers as often as desired, compared to the availability of women-only treatment settings as often as desired, in part, because of the ample supply of female mental health providers across the system, while relatively fewer specialized women's mental health clinics exist. In addition, factors such as provider receptivity to patient questions and preferences (Tai-Seale et al. 2013) and organizational factors such as practice climate (Becker and Roblin, 2008; Roblin et al. 2011) potentially moderate the impact of patient activation on care experiences. However, activation has demonstrated significant effects on patient experiences, even among patients

seen in the same setting by the same provider (Greene et al. 2013), suggesting the importance of patient-level effects even after accounting for environmental factors.

In sum, our results point to patient activation as an important determinant of mental health care experiences, including preference-concordant care. These patient experiences have shown to be good indicators of perceived access to mental health care (Kimerling et al. 2015). The ability to assess both activation and key preferences for services will be important aspects for engaging veterans in proactive, patient-driven mental health care, in keeping with VHA strategic priorities. Many aspects of mental health care are based on the assumptions of high levels of activation, assuming that patients will ask questions about medication if needed or make unprompted requests regarding factors such as provider gender or treatment modality. These behaviors may be more difficult for less activated patients, especially considering that common mental health conditions, such as depression, are associated with lower levels of patient activation (Magnezi et al. 2014). Efforts to enhance patient experiences in mental health care could conceptualize the referral and treatment planning process as a shared decision (Elwyn et al. 2014): inviting collaboration, directly eliciting preferences, and discussing options. Providing this type of structure for patient involvement may be especially helpful to individuals at lower levels of activation. In addition, activation may be a promising construct for titrating treatment intensity, with more structure, monitoring, or supportive services for individuals at lower levels of activation. At the organizational level, data on population preferences for care and consumer input should be used in designing services, so the system has the capacity to be responsive. Continued attention to patient activation in the context of mental health care has potential to enable systems to better engage consumers and deliver care concordant with their needs, values, and preferences.

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Table 1

Sample characteristics by activation level

	All women N = 2466		Level 1 (least activated) (14 %)		Level 2 (15 %)		Level 3 (27 %)		Level 4 (most activated) (43 %)		p value
	%	SE	%	SE	%	SE	%	SE	%	SE	
Age group											0.21
18-44	39.8	0.8	38.4	2.7	42.4	2.6	41.0	1.9	38.6	1.4	
45-64	53.7	0.8	58.0	2.7	50.3	2.6	53.0	1.9	54.0	1.5	
65+	6.5	0.5	3.6	1.2	7.3	1.5	6.0	1.0	7.4	0.9	
Race											0.0001
White	63.1	0.9	47.8	2.8	61.3	2.7	63.1	2.0	68.6	1.4	
Black	28.2	0.8	41.2	2.9	27.3	2.6	28.9	1.9	23.9	1.4	
Other	8.7	0.5	10.9	1.6	11.5	1.6	8.1	1.0	7.5	0.8	
Hispanic Ethnicity	8.1	0.5	7.4	1.4	9.0	1.4	7.7	1.0	8.3	0.8	0.83
Education											0.01
High school or less	14.4	0.7	16.7	2.2	13.5	1.9	13.4	1.4	14.7	1.1	
Any college	50.6	1.1	50.3	2.9	53.7	2.7	55.9	2.0	46.4	1.6	
College graduate	35.0	1.0	33.0	2.7	32.8	2.5	30.8	1.9	40.0	1.5	
Priority group											0.52
Service connected	62.9	1.0	65.4	2.8	61.8	2.6	62.8	2.0	62.5	1.5	
Income eligible/disabled	29.5	0.9	29.5	2.6	29.6	2.5	30.4	1.9	29.0	1.4	
Co-pay	7.6	0.5	5.1	1.3	8.6	1.6	6.8	1.0	8.5	1.0	
Dual mental health use											0.12
VA and non-VA	26.9	0.9	32.1	2.7	26.2	2.4	27.1	1.8	25.2	1.4	
VA only	73.1	0.9	67.9	2.7	73.8	2.4	72.9	1.8	74.8	1.4	
Rural residence	37.1	1.0	39.4	2.8	36.7	2.6	37.5	1.9	36.3	1.5	0.79

N = 2466

SE standard error

Proportions of women with high ratings for VHA mental health care experiences by activation level

Table 2

Mental health care experiences	All women N = 2466		Level 1 (least activated) (14 %)		Level 2 (15 %)		Level 3 (27 %)		Level 4 (most activated) (43 %)		p value for trend
	%	SE	%	SE	%	SE	%	SE	%	SE	
Quality of VA mental health care	51.0	1.1	31.5	2.6	39.3	2.6	48.9	2.0	62.9	1.5	< 0.0001
Ease of getting needed care	58.4	1.0	42.1	2.9	51.7	2.7	57.4	2.0	66.8	1.5	< 0.0001
Gender-related comfort in mental health care setting	77.9	0.9	61.0	2.8	76.1	2.3	77.7	1.7	84.2	1.2	< 0.0001
Female providers as often as wished	65.9	1.0	55.8	2.9	65.5	2.6	64.8	2.0	70.0	1.5	< 0.0001
Did not want female providers	9.0	0.6	8.7	1.7	10.6	1.6	8.3	1.1	8.9	0.9	–
Women-only groups as often as wished	14.5	0.8	13.5	2.0	13.8	1.9	14.1	1.5	15.2	1.2	< 0.01
Did not want groups or did not want women-only	45.7	1.1	35.8	2.8	41.5	2.7	45.4	2.1	50.6	1.6	–
Women-only setting as often as wished	30.7	1.0	24.1	2.5	27.4	2.5	31.9	1.9	33.4	1.5	< 0.0001
Did not want women-only settings	22.8	0.9	17.5	2.2	19.8	2.2	23.6	1.7	25.0	1.4	–

N = 2466

SE standard error

Adjusted odds of high ratings for VHA mental health care experiences as a function of activation level

Table 3

Patient activation level	Quality of VA mental health care		Ease of getting needed care		Gender-related comfort in mental health setting		Female providers as often as wished		Women-only groups as often as wished		Women-only setting as often as wished	
	AOR	95 % CI	AOR	95 % CI	AOR	95 % CI	AOR	95 % CI	AOR	95 % CI	AOR	95 % CI
1	—	—	—	—	—	—	—	—	—	—	—	—
2	1.43 *	1.02, 2.00	1.53 *	1.15, 2.02	1.93 *	1.40, 2.66	1.80 *	1.28, 2.53	1.25	0.71, 2.22	1.35	0.90, 2.01
3	2.04 *, +	1.43, 2.90	1.88 *	1.36, 2.61	2.14 *	1.46, 3.14	1.52 *	1.14, 2.04	1.35	0.85, 2.12	1.79 *	1.24, 2.59
4	3.69 *, +	2.75, 4.95	2.90 *, +	2.24, 3.76	3.18 *, +	2.25, 4.52	2.18 *, +	1.68, 2.83	1.84 *, +	1.17, 2.89	2.11 *	1.48, 3.00

N = 2466

* AOR statistically significant at $p < .05$ + AOR significantly differs from AOR at adjacent lower activation level at $p < .05$