

Are Medical Offices Ready for Value-Based Reimbursement? Staff Perceptions of a Workplace Climate for Value and Efficiency

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ABSTRACT

OBJECTIVES: As value-based reimbursement prepares to enter the outpatient setting, little is known about medical offices' preparedness to face this challenge. Although workplace climate is a strong predictor of organizational performance and patient outcomes, there is a critical lack of evidence regarding a climate for value in frontline medical offices. Our goal was to assess medical office staff member perceptions of a workplace climate for value.

STUDY DESIGN: The Medical OfficeValue and Efficiency Survey, developed by the Agency for Healthcare Research and Quality, was pilot-tested among 2315 workers in 96 medical offices. Of these, 840 completed surveys, 57% of whom were clinical staff members. Most respondents worked full time (86%), had been at their current place of employment for at least 1 year (83%), and worked in larger practices with 11 or more clinical staff (70%).

METHODS: Percentage of positive survey responses was used for comparisons by occupational role and organizational context.

RESULTS: Medical office staff positively responded to 44.6% of the 25 climate survey statements. Clinical staff were more positive, but few had used data to assess the results of performance improvement activities (8.8%), shadowed patients to improve their care experience (12.4%), or served on a committee to make a work process more efficient (15.7%). Among nonclinical staff, those working in smaller medical offices had more positive perceptions than those in larger offices.

CONCLUSIONS: Findings highlight the need for management strategies that emphasize staff training and engagement and the use of performance data and that stress value principles across all organizational activities, including workforce development, performance management, and recruitment.

The American Journal of Accountable Care. 2018;6(2):11-19

With the ongoing implementation of the Medicare Access and CHIP Reauthorization Act of 2015, new physician reimbursement methods continue the trend in payment reform policies attempting to shift the emphasis from volume to value. While the efficacy of such policies is currently being evaluated under many pilot studies,¹ researchers have identified the need to better understand the intrinsic motivators contributing to organizational behavior change.² Organizational climate is the meaning that employees attach to the policies, practices, and procedures they experience in the workplace.³ In healthcare organizations, climate has been empirically associated with staff and patient outcomes.⁴⁻⁹ Workplace climates characterized by high levels of positivity, staff involvement in decision making, and interprofessional collaboration create an appropriate context for the delivery of compassionate, coordinated, and patient-centered services to meet the needs of complex patients.¹⁰ Conversely, negative climates have been attributed to poor patient safety outcomes and failed implementation of new interventions and technologies.^{11,12} Yet, as medical offices prepare for value-based reimbursement, there is a critical lack of evidence regarding staff perceptions of office policies and procedures that facilitate a climate for value in the workplace.

To address this gap, the Agency for Healthcare Research and Quality (AHRQ) sponsored the development and pilot-testing of the Medical Office Value and Efficiency Survey (MOVES). Modeled after the agency's influential patient safety culture program, MOVES was developed to assist managers in assessing the extent to which

medical offices emphasize and adopt processes to promote efficiency, waste reduction, patient-centeredness, care quality, and cost reduction.¹³ Because value-based reimbursement introduces greater financial risk to frontline medical offices, it is essential to assess their readiness to perform in this new environment. Soliciting staff perceptions regarding internal processes and policies has proved fruitful in understanding complex organizational issues, such as patient safety, in hospitals.¹⁴ Similarly, insights from staff with considerable exposure to everyday workplace policies and care delivery practices in frontline providers may offer a unique and highly relevant contribution to this topic.

BACKGROUND

Although little is known about the current climate for value-based care in medical offices, it will be the centerpiece of outpatient reimbursement by 2019 when Medicare's Merit-based Incentive Payment System and alternative payment models (eg, accountable care organizations [ACOs]) will be implemented together as the world's largest pay-for-performance program. Similar efforts are underway in the private sector. The Health Care Transformation Task Force, a new coalition of private insurers and provider organizations, is aiming to move 75% of its contracts into value-based payment models by 2020. As of 2016, about 41% of their contracts were value-based, up from 30% in 2014.¹⁵ By putting providers at financial risk to implement value-based care, there is hope that the United States can begin to reduce the annual \$750 billion (30%) in excess costs spent on low-value care and overuse.¹⁶ At the same time, there is strong interest in keeping small physician-owned medical offices on the front line of value-based care, as recent research shows that they have lower costs and fewer ambulatory care-sensitive admissions.^{17,18} Similarly, the smaller ACOs were found to have performed better in the 2015 Medicare Shared Savings Program.¹⁹

To keep medical offices on the leading edge of value-based care, there is a need to assess their climate for dealing with value-based performance, efficiency, and waste and overuse concepts.

Little is known about clinicians' perceptions of value-based care. The evidence regarding patient perceptions is growing, albeit mixed. A recent AHRQ survey of marketplace consumers found little trust in value-based healthcare, viewing it as an unnecessary external intrusion into their patient–physician relationship.²⁰ Another study, using the AHRQ Consumer Assessment of Healthcare Providers and Systems (CAHPS), found that efforts to improve efficiency and reduce waste in primary care clinics, such as with Lean programs, improved patient satisfaction with access to care but lowered satisfaction concerning interactions with clinicians.²¹

Whether clinicians have perceptions similar to those of patients in these value and efficiency domains is an open question. Recent provider climate surveys have been limited. Since 2004, AHRQ has maintained a family of 5 surveys to assess the climate and culture of organizations with respect to patient safety, collectively called the Surveys on Patient Safety Culture (SOPs).²² However, the SOPs have not emphasized climates of value and efficiency. To address this weakness, MOVES was designed by AHRQ to specifically fit into its current suite of surveys: the 5 SOPs and the 10 CAHPS surveys.²³ In this study, we present the first results from a pilot test of MOVES among 840 staff members in 96 medical offices.

DATA

Medical Office Value and Efficiency Survey

MOVES was developed by AHRQ through its contractor, Health Research & Educational Trust (HRET), and its subcontractor, Westat. The stated goal of the project was to provide tools for managers to assess staff perceptions of 5 important domains for value: (1) staff empowerment, (2) focus on efficiency, (3) patient-centeredness, (4) leadership support for value, and (5) staff training and engagement in quality improvement. Definitions of key terms, such as waste, efficiency, and value, are presented in **Table 1** and were used in the survey instrument. The domains and definitions were identified through a process that included an extensive review of the organizational climate literature concerning healthcare organizations and guidance from an oversight panel comprising both health system leaders and research experts.²⁴

Table 1. Key Terms as Defined in the Medical Office Value and Efficiency Survey

Key Term	Definition Provided in Survey Instructions
Waste	"Waste in healthcare is anything that does not add value or is unnecessary for patients, clinicians, or staff—such as wasted time; wasted materials; extra steps in a process; rework; unnecessary tests, procedures, treatments, or services, etc."
Efficiency	"Efficiency in healthcare refers to care delivery systems and work processes that are as streamlined and simplified as possible."
Value	"Value refers to high-quality care at a reasonable cost and positive patient experiences with care. Efficiency and removing waste are necessary to achieve value."

Survey participants were asked to state their level of agreement with 25 statements as applying to their medical office. As the instrument's purpose was to measure individual perceptions of workplace attributes, the statements were framed using a referent-shift consensus approach consistent in climate survey methodology. The instrument underwent thorough psychometric analysis by Westat, similar to all of Westat's psychometric analyses of the AHRQ SOPs, and is available on AHRQ's website.²⁴ Reliability was strong, with Cronbach's α coefficients of the composites ranging from 0.77 to 0.92, with an average of 0.87.

During the pilot test, HRET worked with the Medical Group Management Association and the American Medical Group Association to help recruit a range of medical office sizes and specialties. The MOVES survey was administered to 2315 workers in a stratified sample of 96 medical offices that varied by geographic location, practice size (ie, number of clinical staff), and type of practice (ie, primary care, multispecialty, and single-specialty/non-primary care). Completed surveys were received from 1081 medical office employees (47% response rate). Of these respondents, 241 participants self-identified as being an owner or partner in their office and were excluded from this analysis. The final sample consisted of 840 completed surveys. Office-level response rates varied from 20% to 100% across the 96 practices.

The extent to which respondents perceived their workplace environment as supporting a climate of value was measured as the percentage of positive responses (PPR) to survey statements. Bivariate analyses compared survey item responses by occupational role, organizational size, and type of practice. Random effects ordinary least squares (OLS) regression examined the relationship of individual and office characteristics with the PPR measure.

RESULTS

Respondent Characteristics

Table 2 presents a summary of survey respondents by occupational and organizational characteristics. A majority of respondents reported performing a clinical role in the practice (57.6%), including physicians (4.3%); nurses (12.1%); physician assistants, nurse practitioners, and other nonphysician providers (6.2%); and other clinical staff (35.0%). Nonclinical personnel made up 39.6% of survey respondents, with most reporting having an administrative, health information technology, or other clerical role. Overall, respondents were mostly full-time staff working at least 33 hours per week (86%) and reporting considerable workplace experience. Almost half of participants (46.1%) had worked between 1 and 6 years at their current medical office. More than one-third (37.6%) reported working at their office for 6 or more years. Finally, most participants worked in either a primary care or a multispecialty practice (53%) with 11 or more clinical staff (70%).

Staff Perceptions of Office Climate for Value and Efficiency

On average, medical office staff positively responded to 44.6% ($SD = 23.1\%$) of the 25 climate statements as applying to their workplace (**Table 3**). Almost three-quarters (74.2%) of respondents reported that their offices work to improve patient flow. Other items receiving a high level of staff agreement included the acknowledgment that office leaders place a high priority on working efficiently without compromising patient care (69.6%), that the office has taken steps to reduce patient wait times (65.2%), and that staff actively try to find ways to reduce waste in work processes (62.6%).

Less agreement was observed within the training and engagement domain, where respondents were presented with specific activities designed to improve efficiency and waste reduction. Few respondents reported having used data in the past year to assess the results of an activity to improve efficiency (8.8%), having shadowed patients to identify ways to improve their care experience (12.4%), or having served on a team or committee to make

Table 2. Respondent Characteristics (N = 840)

Occupational Category	n (%)
Clinical	484 (57.6)
Physician	36 (4.3)
Nurse, LVN, LPN	102 (12.1)
PA, NP, CNS, midwife, etc	52 (6.2)
Other clinical staff	294 (35.0)
Nonclinical	333 (39.6)
Management	55 (6.5)
Admin, HIT, other clerical	270 (32.1)
Other/unknown	8 (1.0)
Tenure at Medical Office	
<2 months	12 (1.5)
2 months to <1 year	123 (14.9)
1 to <3 years	194 (23.5)
3 to <6 years	186 (22.6)
6 to <11 years	167 (20.3)
≥11 years	142 (17.2)
Unknown/missing	12 (1.5)
Employment Status (hours per week)	
Part time (≤16)	17 (2.0)
Part time (17-32)	91 (10.8)
Full time (33-40)	542 (64.5)
Full time (≥41)	178 (21.2)
Medical Office Attributes	
Office size (n of clinical staff)	
Small (3-5)	82 (9.8)
Medium (6-10)	182 (21.7)
Large (≥11)	576 (68.6)
Office type	
Primary care	236 (28.1)
Single-specialty, non-primary care	392 (46.7)
Multispecialty	212 (25.2)

CNS indicates clinical nurse specialist; HIT, health information technology; LPN, licensed practical nurse; LVN, licensed vocational nurse; NP, nurse practitioner; PA, physician assistant.

a work process more efficient (15.7%). Of the 8 items presented in the training and engagement domain, only having made a suggestion about improving an inefficient work process received a positive response from a majority of participants (55.0%).

Staff Differences by Occupational Role

Table 3 presents bivariate analyses of survey items and climate dimension scores by clinical and nonclinical staff. Overall, clinical office staff responded positively to 3.5% more statements, on average, compared with their nonclinical colleagues. Significant differences in mean climate dimension scores were observed for the patient-centeredness and training and engagement domains. Clinical staff were more likely than nonclinical colleagues to agree that their office focused on eliminating unnecessary tests and procedures, took steps to reduce patient wait time, and sought patient or family member input on improving efficiency. In addition, clinical staff reported a higher level of engagement in training and waste reduction activities than nonclinical participants. Participation was higher among clinical staff for certain activities: having followed patients to identify ways of improving patient care, made a suggestion to management to improve the patient care experience, and looked at visual displays or graphs of office performance. Clinical staff were more likely than nonclinical personnel to rate their office as “very good” to “excellent” for providing care based on scientific knowledge.

Staff Differences by Organizational Context

Differences in staff perceptions were observed across multiple climate dimensions by practice size and type (Table 4). Staff members in primary care offices had, on average, 4.1% more positive responses overall compared with personnel in single-specialty and multispecialty offices, and they had significantly higher mean scores for 3 of 6 climate dimensions surveyed: patient-centeredness (+11%), focus on efficiency (+6%), and training and engagement (+4%).

Table 3. Staff Responses by Value Climate Dimensions (clinical and nonclinical staff)

Value Climate Dimensions	All Cases (N = 840)	Clinical Staff (n = 484)	Nonclinical Staff (n = 356)
Staff Empowerment ($\alpha = 0.77^a$)			
“We are involved in making decisions about changes to our work processes,” n (%)	396 (47.1)	220 (45.4)	176 (49.4)
“We are encouraged to come up with ideas for more efficient ways to do our work,” n (%)	509 (60.6)	291 (60.1)	218 (61.2)
“We are given opportunities to try out solutions to workflow problems,” n (%)	425 (50.6)	235 (48.5)	190 (53.4)
Empowerment index (0-3), mean (SD)	1.58 (1.23)	1.54 (1.22)	1.64 (1.26)
ICC(1) = 0.05; ICC(2) = 0.32			
Focus on Efficiency ($\alpha = 0.60^b$)			
“We try to find ways to reduce waste (such as wasted time, materials, steps, etc) in how we do our work,” n (%)	526 (62.6)	298 (61.6)	228 (64.0)
“In our office, we are working to improve patient flow,” n (%)	623 (74.2)	363 (75.0)	260 (73.0)
“We focus on eliminating unnecessary tests and procedures for patients,” n (%)	448 (53.3)	287 (59.3)	161 (45.2)***
Efficiency index (0-3), mean (SD)	1.90 (1.06)	1.96 (1.05)	1.82 (1.07)
ICC(1) = 0.05; ICC(2) = 0.30			
Patient-Centeredness ($\alpha = 0.62^b$)			
“We take steps to reduce patient wait time,” n (%)	548 (65.2)	338 (69.8)	210 (59.0)**
“We ask for patient or family member input on ways to make patient visits more efficient,” n (%)	279 (33.2)	181 (37.4)	98 (27.5)**
“Patient and family member preferences have led to changes in our workflow,” n (%)	260 (30.9)	166 (34.3)	94 (26.4)*
Patient-centeredness index (0-3), mean (SD)	1.29 (1.06)	1.41 (1.06)	1.13 (1.04)***
ICC(1) = 0.11; ICC(2) = 0.53			
Leadership Support for Value ($\alpha = 0.75^a$)			
“[Leaders] take action to address workflow problems that are brought to their attention,” n (%)	512 (60.9)	294 (60.7)	218 (61.2)
“[Leaders] recognize us for our ideas to improve efficiency,” n (%)	414 (49.3)	243 (50.2)	171 (48.0)
“[Leaders] provide us with reports on our office performance”, n (%)	397 (47.3)	238 (49.2)	159 (44.7)
“[Leaders] place a high priority on doing work efficiently without compromising patient care,” n (%)	585 (69.6)	342 (70.7)	243 (68.3)
Leadership index (0-4), mean (SD)	2.27 (1.47)	2.31 (1.46)	2.22 (1.49)
ICC(1) = 0.11; ICC(2) = 0.51			

(continued)

Table 3. (Continued) Staff Responses by Value Climate Dimensions (clinical and nonclinical staff)

Training and Engagement in Efficiency and Waste Reduction ($\alpha = 0.67$) ^c			
In the past 12 months,			
"I received training on how to identify waste and inefficiencies in my work," n (%)	270 (32.1)	165 (34.1)	105 (29.5)
"I helped to map a workflow process to identify wasted time, materials, steps in a process, etc," n (%)	169 (20.1)	97 (20.0)	72 (20.2)
"I shadowed/followed patients in this office to identify ways to improve their care experience," n (%)	104 (12.4)	81 (16.7)	23 (6.5)***
"I looked at visual displays or graphs to see how well my office was performing," n (%)	175 (20.8)	115 (23.8)	60 (16.8)*
"I made a suggestion to management about improving an inefficient work process," n (%)	462 (55.0)	284 (58.7)	178 (50.0)*
"I made a suggestion to management about improving patients' care experience," n (%)	358 (42.6)	235 (48.5)	123 (34.5)***
"I served on a team or committee to make a work process more efficient," n (%)	132 (15.7)	67 (13.8)	65 (18.3)
"I monitored data to figure out how well an activity to improve efficiency was working," n (%)	74 (8.8)	37 (7.6)	37 (10.4)
Training and engagement index (0-8), mean (SD)	2.08 (1.82)	2.23 (1.82)	1.86 (1.80)**
ICC(1) = 0.11; ICC(2) = 0.51			
Office Performance for Value ($\alpha = 0.86$) ^d			
How well would you rate your medical office on each of the following:			
"[My office] is responsive to individual patient preferences, needs, and values," n (%)	500 (59.5)	290 (59.9)	210 (59.0)
"[My office] provides services based on scientific knowledge to all who could benefit," n (%)	502 (59.8)	311 (64.3)	191 (53.6)**
"[My office] minimizes waits and potentially harmful delays," n (%)	357 (42.5)	206 (42.5)	151 (42.4)
"[My office] ensures cost-effective care (avoids waste, overuse, and misuse of services)," n (%)	350 (41.7)	197 (40.7)	153 (43.0)
Office performance for value (0-4), mean (SD)	2.03 (1.65)	2.07 (1.61)	1.98 (1.70)
ICC(1) = 0.12 ; ICC(2) = 0.55			
Value Climate Perception ($\alpha = 0.87$)			
PPR, mean (SD)	.446 (.231)	.461 (.229)	.426 (.234)*
ICC(1) = 0.11; ICC(2) = 0.51			

ICC indicates intraclass correlation coefficient; PPR, percentage of positive responses.

* $P < .05$; ** $P < .01$; *** $P < .001$.

^cAnswer choices ranged from "strongly disagree" to "strongly agree." Positive response was defined as a response of "agree" or "strongly agree."

^dAnswer choices ranged from "never" to "always." Positive response was defined as a response of "most of the time" or "always."

^eAnswer choices were "yes" or "no." Positive response was defined as a response of "yes."

^fAnswer choices ranged from "poor" to "excellent." Positive response was defined as a response of "very good" or "excellent."

Similarly, staff members in large medical offices were less positive than colleagues in small- and medium-sized practices. Mean PPR was 4.2% less, on average, for staff in large practices, with relative differences for staff empowerment (-8%), leadership support (-7%), and training and engagement (-4%).

Multivariate Results

Table 5 presents the results of random effects OLS regression analyses to test for associations of individual and office attributes with climate survey PPR measures. Clinical and nonclinical models were tested in addition to the full sample. Differences were observed based on occupational role, tenure, employment status, and practice size in the full model. Respondents who reported having a managerial role in the office had 16% higher PPR scores compared with the occupational category of other clinical staff ($P < .0001$). Staff members with 3 or fewer years of tenure were 4% to 5% more positive than colleagues with more than 6 years of tenure, and part-time staff were 6% less positive compared with full-time workers ($P = .006$). At the organizational level, clinical staffers in small offices were 9% more positive compared with workers in large practices ($P = .006$). No differences were observed by practice type. Medical office attributes accounted for less than 1% of the variance in the full model.

The clinical and nonclinical models revealed differences by occupational role. Tenure differences were observed as the only significant factor associated with the PPR measure among clinical staff. Specifically, clinical staff with less than 6 years of tenure were between 5.7% and 10.2% more positive than clinical staff with longer tenure. No differences were observed in mean PPR scores among clinical staff based on clinical occupation, employment status, or organizational attributes. Medical office characteristics accounted for less than 1% of the variance in the clinical staff model. Conversely, differences in mean PPR scores

Table 4. Mean (SD) Climate Dimension Scores by Practice Type and Size (N = 840)

Climate Dimension	All (N = 840)	Practice Type			Practice Size			<i>t</i> test	<i>P</i>
		Primary Care (n = 236)	Other ^a (n = 604)	<i>t</i> Test	<i>P</i>	Large (n = 576)	Other ^b (n = 264)		
Staff empowerment (0-3)	1.58 (1.23)	1.60 (1.21)	1.58 (1.24)	-0.21	.836	1.50 (1.23)	1.75 (1.23)	2.72	.007
Focus on efficiency (0-3)	1.90 (1.06)	2.02 (1.02)	1.85 (1.08)	-2.05	.041	1.87 (1.06)	1.98 (1.06)	1.40	.160
Patient-centeredness (0-3)	1.29 (1.06)	1.54 (1.04)	1.20 (1.06)	-4.26	<.0001	1.32 (1.07)	1.23 (1.06)	-1.09	.276
Leadership support (0-4)	2.27 (1.47)	2.41 (1.47)	2.21 (1.47)	-1.77	.077	2.18 (1.48)	2.46 (1.43)	2.60	.009
Staff training and engagement (0-8)	2.08 (1.82)	2.30 (1.80)	1.99 (1.82)	-2.20	.028	1.98 (1.81)	2.29 (1.84)	2.29	.022
Office performance (0-4)	2.03 (1.65)	2.04 (1.67)	2.03 (1.64)	-0.04	.968	1.97 (1.68)	2.17 (1.58)	1.57	.116
Overall (PPR)	.446 (.231)	.476 (.230)	.435 (.231)	-2.36	.019	.433 (.227)	.475 (.238)	2.47	.014

PPR indicates percentage of positive responses.

^aIncludes single-specialty (non-primary care) and multispecialty medical offices.

^bIncludes small- and medium-sized medical offices.

for nonclinical staff were positively associated with identification as a manager ($P < .001$) and with a small practice size ($P = .026$). PPR scores were negatively associated with part-time employment status ($P = .020$). Medical office attributes accounted for almost 16% of the variance in the nonclinical staff model.

DISCUSSION

This study is the first empirical examination of staff perceptions of a climate for value in medical offices. More than 800 medical office staff, both clinical and nonclinical, in 96 medical offices shared their perceptions of workplace practices, policies, and procedures across 6 dimensions: staff empowerment, focus on efficiency, patient-centeredness, leadership support for value, staff training and engagement, and office performance. In preparation for the expansion of value-based payment mechanisms to the outpatient setting, these findings address the crucial lack of evidence regarding the extent to which medical office staff perceive a climate for value in their workplace and the extent to which staff perceptions may differ by occupational role and organizational context.

Overall, medical office staff members responded positively to less than half (44.6%) of the 25 climate statements as applying to their workplaces. Only 8 statements received a positive response from a majority of participants. Regarding performance, almost 60% rated their office as “very good” or “excellent” for being responsive to individual patient preferences, needs, and values and for providing services based on scientific knowledge to all who can benefit. Less than half rated their office’s performance as high for minimizing waits and potentially harmful delays (42.5%) and for ensuring cost-effective care (41.7%). No differences were observed in office performance ratings by occupational role.

A majority of workers responded positively to all 3 of the statements in the efficiency dimension. Medical office staff agreed that their workplaces are active in finding ways to reduce waste in work processes (62.6%), working to improve patient flow (74.2%), and focusing on eliminating unnecessary tests and procedures (53.3%). Conversely, positive responses were generally low within the patient-centeredness dimension. Although 65.2% agreed that their offices took steps to reduce patient wait time, only one-third agreed that their office asked for patient and family member input on ways to make patient visits more efficient. Similarly, 30.9% agreed that patient and family member preferences have led to changes in office workflow. Medical offices that have adopted these patient-centered practices may be better prepared for reimbursement methodologies that reward based on patient experience.

A related finding was the generally low level of reported training and engagement in value-enhancing activities. Although clinical staff reported a higher level of engagement over the past year compared with nonclinical personnel (*t* test, -2.931; $P = .003$), their mean number of reported activities was only 2.08 of 8 (SD = 1.82). Just 32.1% of respondents had received training in efficiency and waste reduction over the past year. Less than one-fourth reported helping to map a workflow process to identify wasted time, materials, or steps (20.1%), or looking at visual displays or graphs to see how well the office was performing (20.8%). Less than 10% reported using data to assess if improvement activities were in fact working. These findings highlight the need for management strategies that emphasize training and engagement in value-enhancing activities, for making performance data visual and available to staff to review, and for recognizing individuals and teams that strive to enhance value in the practice.²⁵

Table 5. Random Effects Ordinary Least Squares Regression of Individual and Medical Office Attributes on Respondent PPR: Full, Clinical, and Nonclinical Models

	Percentage of Positive Responses					
	All Cases ^a		Clinical Staff Only ^a		Nonclinical Staff Only ^b	
	Coefficient (SE)	P	Coefficient (SE)	P	Coefficient (SE)	P
Respondent Attributes						
Management	.16 (.03)	<.0001			.186 (.03)	<.0001
Physician	.06 (.04)	.122	.043 (.04)	.283		
Nurse, LVN, LPN	.04 (.03)	.147	.035 (.03)	.196		
PA, NP, CNS, midwife, etc	.07 (.03)	.038	.043 (.03)	.206		
Admin/HIT/clerical staff	-.03 (.02)	.145				
Tenure (<1 year)	.05 (.02)	.030	.102 (.03)	.001	.011 (.03)	.750
Tenure (1-3 years)	.04 (.02)	.042	.057 (.03)	.039	.029 (.03)	.379
Tenure (3-6 years)	.04 (.02)	.068	.058 (.03)	.036	.022 (.03)	.498
Part-time staff	-.06 (.02)	.006	-.033 (.03)	.231	-.088 (.04)	.020
Medical Office Attributes^c						
Practice size: small	.09 (.03)	.006	.073 (.04)	.071	.113 (.05)	.026
Practice size: medium	.02 (.02)	.416	.050 (.03)	.094	-.015 (.04)	.686
Primary care practice	.03 (.03)	.293	.003 (.03)	.915	.064 (.04)	.144
Single-specialty practice (non-primary care)	-.03 (.03)	.214	-.036 (.03)	.237	-.026 (.04)	.478
Constant	.42 (.03)	<.0001	.412 (.03)	<.0001	.394 (.04)	<.0001
n	840		484		356	
Wald χ^2	65.92	<.0001	26.63	<.0001	54.43	<.0001
Number of medical offices	96		89		92	
Rho	.08		.062		.157	

CNS indicates certified nurse specialist; HIT, health information technology; LPN, licensed practical nurse; LVN, licensed vocational nurse; NP, nurse practitioner; PA, physician assistant; SE, standard error.

^aReference category is other clinical staff, full-time, with 6 or more years of tenure.

^bReference category is admin/HIT/clerical staff, full-time with 6 or more years of tenure.

^cReference category is large-sized, multispecialty practices.

The study found differences in value climate perceptions by occupational role and organizational context, although specific factors influenced groups differently. Overall, clinical staff were more positive than nonclinical personnel across multiple climate dimensions. In the clinical staff analysis, no differences were observed by occupational role (eg, physician, nurse, nonphysician provider, clinical staff), employment status (full time vs part time), or by medical office size or type. Office tenure was found to be negatively associated with value climate perceptions among clinical

staff. Among nonclinical staff, differences in value climate perceptions were observed by occupational role (manager vs nonmanager), employment status (full time vs part time), and practice size (small vs large). The organizational context accounted for considerably more variance in the nonclinical model, supporting the importance of emphasizing value climate principles not only in care delivery processes but across all organizational activities to include workforce and team development, performance management, and recruitment/selection programs.^{26,27}

Limitations

There are several limitations to this study which should be considered when interpreting the results. First, the sample was made up of staff personnel employed by 96 medical offices participating in a pilot study of the survey instrument. Although the organizations were diverse across contextual aspects and geographic location, these medical offices may not be representative of the population of medical offices currently active in the United States. Second, participants were restricted to identifying themselves by only 1 of the occupational answer choices. It may be that some respondents serve in both a managerial and a clinical capacity at their workplace, but it was not possible to identify this category of staff in the survey data. Finally, the cross-sectional nature of the data restricts the analysis to a correlational design and subjects the findings to the potential for omitted variable bias.

CONCLUSIONS

This study assessed perceptions of 840 medical office staff regarding a climate for value in their workplace. Participants reported a generally low level of agreement for value climate items, but differences were noted by office role, tenure, and organizational size. Instituting deliberate policies and processes that incorporate patient input into workflow and that foster staff engagement in value-enhancing activities may be effective strategies for creating a workplace environment conducive to success under value-based reimbursement methodologies.

Acknowledgments

This study was funded by AHRQ. The views here do not necessarily reflect the views or policies of AHRQ or HHS. The authors would like to thank the Westat team, Joann Sorra, Theresa Famolaro, and Naomi Yount, as well as Kevin Kenward from HRET, for their work in pilot-testing the MOVES survey.

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Source of Funding: Agency for Healthcare Research and Quality.

Author Disclosures: The authors report no relationship or financial interest with any entity that would pose a conflict of interest with the subject matter of this article.

Authorship Information: Concept and design (RKM, WEE); acquisition of data (WEE); analysis and interpretation of data (RKM); drafting of the manuscript (RKM); critical revision of the manuscript for important intellectual content (RKM, WEE); statistical analysis (RKM); and obtaining funding (WEE).

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