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Authors

El-Ibiary, Shareen Y
Salib, Mina
Lee, Kelly C

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BRIEF

Assessment of Areas of Worklife Among Pharmacy Educators

Shareen Y. El-Ibiary, PharmD,^a Mina Salib, PharmD,^b Kelly C. Lee, PharmD^c

^a Midwestern University, College of Pharmacy, Glendale, Arizona

^b CVS Pharmacy, Peoria, Arizona

^c University of California, San Diego Skaggs School of Pharmacy and Pharmaceutical Sciences, San Diego, California

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Objective. To assess in pharmacy academicians the six domains of worklife (community, control, fairness, reward, workload, values) that have been associated with burnout and poor job satisfaction.

Methods. We aimed to assess the Areas of Worklife Survey (AWS) among a sample of pharmacy academicians attending a national meeting to evaluate personal, environmental, or workplace factors that may influence the worklife environment. Data were analyzed using SPSS, descriptive statistics were identified, and Kruskal-Wallis and Pearson correlations were performed.

Results. The participant response rate was 40% (n=49/121 attendees). Eighty-eight percent of participants reported working more than 40 hours per week. Mean AWS scores ranged from 2.7 to 3.9 (whereby 1 indicated a strong mismatch between person and work environment and 5 indicated a strong match). The workload and fairness domains had the lowest reported scores, whereas control had the highest. Higher mean scores were reported for control and reward in those with a mentor and for fairness in those having a hobby.

Conclusion. Participants gave the lowest ratings to two worklife areas, workload and fairness. Developing targeted interventions, such as in mentorship, hobbies, and transparency in the work setting, may be important for preventing burnout in pharmacy academicians. Further studies in a larger population may help to determine factors associated with the areas of worklife that received low ratings.

Keywords: areas of worklife, pharmacy, faculty, burnout

INTRODUCTION

According to literature and the National Academy of Medicine, health care professionals are facing high levels of burnout.¹⁻⁵ Burnout is defined as emotional exhaustion, maladaptive detachment, and low personal accomplishment in response to prolonged work stress.^{1,6} In 2015 and 2016, nationwide surveys found that over 40% of pharmacy practice faculty and 57% of clinical pharmacists reported high levels of emotional exhaustion.^{4,5} Burnout in other health care professions has been reported at rates of 35%-54% in nurses and in 50% of physicians.² Burnout can result in reduced productivity, absenteeism, job turnover, and low organizational commitment, affecting morale, increasing the risk of depression and suicide, causing career regret, and hindering professional development.^{1,7,8} The National Academy of Medicine reports the estimated

societal cost attributed to burnout is 4.6 billion dollars each year in the United States.¹

As found by Leiter and Maslach, one of the main contributors to occupational stress and burnout is job-person fit, namely the extent to which one's expectations of his or her job match the work environment.^{9,10} Maslach and colleagues identified six areas of worklife that affect job-person fit and developed the Areas of Worklife Survey (AWS).⁹⁻¹¹ The AWS domains include values (personal and organizational values match), control (having input into decisions that affect one's work), reward (recognition and receiving attention for one's work), fairness (free from bias or injustice), workload (amount of work to be done), and community (relationships in the workplace).¹¹ The AWS has been administered to nurse practitioners, surgeons, primary care physicians, and others in the medical field.¹²⁻¹⁵ To our knowledge, no studies using the AWS in pharmacy or pharmacy education have been published.

The objective of this study was to assess worklife environment using the AWS in a sample of pharmacy

Corresponding Author: Shareen El-Ibiary, Midwestern University, College of Pharmacy, 19555 N. 59th Ave., Glendale, AZ 85308. Tel: 623-572-3512. Email: selibi@midwestern.edu

academicians attending a national meeting. Personal, environmental, or workplace factors that may influence areas of worklife could be potential targets for improving job-person fit and potentially preventing burnout.

METHODS

In spring 2019, we administered an anonymous, voluntary survey to academicians attending the American Association of Colleges of Pharmacy (AACCP) Spring 2019 Institute on Faculty and Student Well-Being. The six worklife areas were assessed using the 28-question AWS purchased from Mindgarden.com (Mind Garden Inc). Respondents were asked to rate their agreement with each statement using a five-point Likert scale (1=strongly disagree, 2=disagree, 3=hard to decide, 4=agree, and 5=strongly agree). The AWS is scored by calculating six scores, one for each area of worklife (exact calculation schema is not provided due to its proprietary nature). In the original validation study, Leiter and Maslach showed that lower scores indicate a higher degree of mismatch or incongruence between the respondent and the workplace.¹⁶ They also showed that the AWS was consistently highly correlated with the three burnout dimensions (emotional exhaustion, depersonalization, personal accomplishment) as measured by the Maslach Burnout Inventory. We also included demographic questions as well as work-related items that have been previously associated with burnout.^{5,17} Completion of the paper surveys served as consent, and data were entered into Qualtrics (Qualtrics International Inc). Descriptive statistics were used to characterize demographic and faculty characteristics. Mean AWS scores were calculated to compare this sample to normative samples from validation studies.¹⁸ Pearson correlations were used to measure relationships between worklife areas and demographic variables. All data were analyzed using SPSS, version 26.0 (IBM Corp). The study was approved by the Midwestern University Institutional Review Board.

RESULTS

Of the 121 attendees, 49 completed the survey (40.4%). Demographic results are listed in Table 1. These demographics are consistent with the current demographics of the Academy, except that our sample had a higher number of women and Black or African American respondents.¹⁹ The mean AWS scores ranged from 2.7 to 3.9, where one represents a strong mismatch between the person and their work environment, and five represents a strong match between the person and work environment. The worklife areas with the lowest mean scores were workload and fairness, whereas the area with the highest mean score was control (Table 2).

Table 1. Key Demographics of Pharmacy Academicians Who Responded to the Areas of Worklife Survey While Attending a National Meeting (N=49)

Characteristic^a	Response
Female, No. (%)	41 (84)
Age (y), mean (SD)	42 (9)
Marital status, No. (%)	
Single	8 (16)
Married/cohabitating	38 (78)
Divorced/separated	3 (6)
Ethnicity, No. (%)	
Caucasian/White	33 (67)
African American/Black	11 (22)
Asian	3 (6)
Hispanic/Latino	1 (2)
Other/mixed	1 (2)
Have children, No. (%)	35 (71)
Children aged one to 12 years old	21 (62)
Children less than one year old	1 (4)
Academic rank, No. (%)	
Instructor/lecturer	1 (2)
Assistant professor	15 (33)
Associate professor	18 (40)
Professor	11 (24)
Type of institution, No. (%)	
Private	17 (35)
Public	31 (65)
Length of pharmacy program, No. (%)	
Three years	2 (4)
Four years	43 (96)
Tenure status, No. (%)	
Nontenured, nontenure-track	27 (60)
Nontenured, tenure-track	7 (16)
Tenured	11 (24)
Current salary, No. (%)	
<\$90,000	5 (11)
≥\$90,000	40 (89)
Total years worked after pharmacy graduation, mean (SD)	16 (8)
Total years worked at current institution, mean (SD)	8 (6)
Have a clinical practice site, No. (%)	21 (46)
Hours worked per week, mean (SD)	20 (10) ^b
Have didactic teaching responsibilities	40 (89.9)
Hours per year, mean (SD)	287 (567) ^c
Have a mentor, No. (%)	
Yes	29 (62)
No	18 (38)

(Continued)

Table 1. (Continued)

Characteristic ^a	Response
Have an administrative role, No. (%)	27 (60)
Assistant/Associate Dean/Director of Student Affairs/Student Success	8 (31)
Assistant/Associate Dean of Academic/Curriculum Affairs	2 (8)
Assistant/Associate Dean/Director of Experiential Education	2 (8)
Department Chair	3 (12)
Vice Chair	2 (8)
Other ^d	9 (35)
Frequency of exercise, hrs/wk, No. (%)	
0-1	16 (34)
2-3	13 (28)
4-5	10 (21)
>6	8 (17)
Have a hobby, No. (%)	33 (70)

^a Fewer than four missing responses for any item.

^b Range: 4-40.

^c Range: 10-2080.

^d Other included the Director of Graduate Studies, Director of Residency, Director of Student and Faculty Development, and the Associate Dean for Professional Affairs and Community Engagement.

The mean scores for each worklife area did not differ between men and women, those with children and without, type of institution, academic rank, salary, clinical practice, or administrative role. A significant difference in mean scores for control was found based upon tenure status (reported mean [SD]; nontenured, nontenure-track = 4.04 [.60]; nontenured, tenure-track = 3.54 [.55]; tenured = 3.59 [.58]; $p=.04$). Further, we found significant differences in the mean rank scores for some worklife domains depending on whether respondents had a mentor or hobby (Table 2). Those who had a mentor had higher mean scores for control and reward compared to those without a

mentor; those who had a hobby had higher mean scores on the fairness domain than those without a hobby. The mean scores for community were highest among those who reported exercising four to five hours per week (3.88 [.74]) compared to those who reported exercising zero to one hour per week (2.94 [0.82]; $p=.03$). A similar trend was seen for the fairness domain, in which the mean rank score was highest for those reporting exercising four to five hours per week (3.12 [.61]) compared to those who reported exercising zero to one hour per week (2.39 [0.67]; $p=.04$). The domains of control and fairness were both positively correlated with the number of hours per week spent at a clinical practice but were negatively correlated with the number of hours per year devoted to didactic teaching (Table 3).

DISCUSSION

Leiter and colleagues identified six areas of worklife that contribute to job-person fit, which is an integral part of work engagement.⁶⁻⁸ The stronger the match between these worklife domains and an individual's work expectations, the better the fit, which may help people engage more with work and decrease the risk of burnout.⁷

The lowest-rated areas of worklife in this study were workload and fairness. The majority of pharmacy faculty who took part in this study worked over 40 hours per week, and more than one-third worked over 50 hours per week, indicating that academicians have high workweek hours. High workweek hours (>40 hours/week) have been found among those with emotional exhaustion and burnout.^{5,17,20} Students' excessive demands have been positively related to emotional exhaustion and negatively related to work engagement.²¹ Furthermore, changes in the current pool of pharmacy applicants may also affect needs or demands of students that faculty may face.²² Overall, workload may be a modifiable factor that administrators should regularly review and adjust. Options may include increasing the number of faculty, distributing the

Table 2. Mean Scores for Areas of Pharmacy Academicians' Worklife Stratified by Mentor and Hobby

	Overall mean (SD) N=49 [score range]	Mentor mean (SD) n=29	No mentor mean (SD) n=18	<i>p</i> value	Hobby mean (SD) n=33	No hobby mean (SD) n=14	<i>p</i> value
Workload	2.68 (0.8) [1.2-4.2]	2.71 (.80)	2.64 (.8)	.80	2.83 (.8)	2.34 (.9)	.06
Control	3.87 (0.6) [2.5-5.0]	4.01 (.6)	3.63 (.6)	.03	3.92 (.5)	3.73 (.8)	.35
Reward	3.25 (0.9) [1.0-4.8]	3.50 (.9)	2.88 (.8)	.02	3.36 (.8)	3.01 (1.1)	.21
Community	3.42 (0.8) [1.2-5.0]	3.53 (.8)	3.13 (.8)	.11	3.49 (.8)	3.14 (.9)	.19
Fairness	2.77 (0.6) [1.3-4.0]	2.82 (.6)	2.60 (.6)	.25	2.87 (.6)	2.43 (.6)	.02
Values	3.59 (0.6) [2.0-5.0]	3.66 (.7)	3.44 (.5)	.29	3.66 (.7)	3.38 (.5)	.17

^a The lower the score, the higher potential for job-person mismatch.

Table 3. Correlation Analysis for Areas of Worklife and Clinical Practice and Teaching Hours

	Number of hours in clinical practice	Number of hours of didactic teaching	Workload	Control	Reward	Community	Fairness	Values
Number of hours in clinical practice	1	-.55 ^a	.11	.578 ^b	.07	.22	.32	.09
Number of hours for didactic teaching	-.55 ^a	1	-.30	-.36 ^a	.05	-.06	-.41 ^a	.12
Workload	.11	-.30	1	.456 ^b	.38 ^b	.32 ^a	.28	.08
Control	.59 ^b	-.36 ^a	.46 ^b	1	.54 ^b	.57 ^b	.50 ^b	.45 ^b
Reward	.07	.05	.38 ^b	.536 ^b	1	.57 ^b	.43 ^b	.44 ^b
Community	.22	-.06	.32 ^a	.574 ^b	.57 ^b	1	.65 ^b	.63 ^b
Fairness	.32	-.41 ^a	.28	.504 ^b	.43 ^b	.65 ^b	1	.56 ^b
Values	.09	-.12	.08	.446 ^b	.44 ^b	.63 ^b	.56 ^b	1

^a Correlation significant at .05 level, two-tailed.

^b Correlation significant at .01 level, two-tailed.

workload, increasing support staff to minimize administrative burden, having clearly defined work duties, or adjusting promotion expectations. A study by Conklin and colleagues revealed excessive workload to be one of the top reasons for leaving an institution.²³

Fairness was also rated lower than other areas of worklife. Maslach and colleagues highlighted that injustice in the workplace can discourage engagement and increase emotional exhaustion,⁹ and it may cause employees to distance themselves from work emotionally and physically.^{9,10} In addition, unfairness may decrease employees' trust in, collegiality/community within, and loyalty to the institution, causing turnover or resulting in employees leaving academia completely.^{9,23} Our data suggest that worklife environment issues may exist within pharmacy academia that may need to be modified. Some solutions may include increasing transparency in the promotion process, equilibrating workload distribution and compensation, fostering civility, and creating a culture of inclusion and belonging.⁹ Incivility (whether short- or long-term) in the workplace can have devastating consequences for an organization. Incivility in the workplace can result in decreased work effort, decreased time spent at work, lost work time due to worrying about an incident or avoiding the offender, and decreased commitment to an organization.²⁴ In addition to faculty taking responsibility for their behaviors and interacting professionally with others, leaders can use strategies to improve workplace civility, such as modeling good behavior, asking for feedback, rewarding positive behavior, penalizing poor behavior, and conducting exit interviews.^{24,25}

Control was the highest-rated item among participants. Those with a clinical site felt that they had more control in their workplaces. Perhaps those with a clinical

practice feel they have more opportunities to participate in workplace decisions or are able to exercise more autonomy at their practice sites versus those without a clinical practice. In another study, the majority of a sample of faculty physicians reported that the most meaningful part of their job was patient care and that when they spent less than 20% of their time doing the most meaningful work, they had higher rates of burnout (53.8% vs 29.9%, $p < .001$).²⁶ Identifying what faculty value most in their job may be a strategy to help prevent and reduce faculty burnout.²⁶ Shared governance can also give faculty a sense of control in the workplace and improve faculty satisfaction and potentially retention; however, according to an AACP report, great variability exists in how shared governance is practiced within schools of pharmacy.²⁷⁻²⁹ Institutions should put forth increased effort to ensure that all full-time faculty members have the opportunity to participate in governance. In the previously referenced study by Conklin and colleagues, a top reason that pharmacy faculty gave for remaining at their institution was autonomy, potentially indicating that control is an important domain for pharmacy academicians even through factors such as workload may result in leaving academia.²³

In our study, nontenure-track academicians reported having a greater sense of control in worklife than did those who were striving for tenure or who had achieved tenure. Perhaps for nontenure-track academicians, the perception or ability to freely change positions may contribute to one's sense of control in worklife, whereas those who are devoting or have devoted considerable time to achieve tenure may feel they have fewer options. This seems counterintuitive, as tenure status is generally regarded as desirable because it offers security of a position; however, those with tenure may feel they do not want leave an institution

and lose their hard-earned tenure to begin elsewhere possibly without tenure. In addition, for those seeking tenure, they may not want to jeopardize their chances of tenure and feel they have decreased control to decline duties or opportunities.

Our data show that having a mentor may help improve the perception of control and reward. Both areas were rated significantly higher in participants who had a mentor compared to those without. Mentoring has been cited in other research as a way to possibly prevent burnout, increase job satisfaction, decrease turnover, and increase success at work, in particular for junior faculty.^{5,30,31} Mentors and role models have been shown to create a supportive community in addition to promoting professional growth.³⁰⁻³²

Our data show that having a hobby may influence perceptions of fairness. Leisure activities are defined as pleasurable activities that individuals voluntarily engage in, free from the constraints of work or other responsibilities. Leisure activities can include hobbies such as sports, socializing, spending time alone or in nature, and relaxation activities that lead to positive thoughts. Such activities often require minimal mental effort, give a sense of “being away,” and provide distraction or relief from recurrent negative thoughts.³³ It is plausible that those with a hobby ruminate less on work issues because they are otherwise engaged. Pressman and colleagues found that enjoyable leisure activities may be associated with psychological and physical well-being.³³ Hobbies have also been shown to improve physical health, reduce stress, and improve work performance.³³ Thus, one strategy to incorporate and help to sustain work-life balance may be to encourage faculty to develop or maintain hobbies.

Our study was limited by a small sample size, and differences between groups may not have been detected due to the small sample. Data were limited to those who attended the AACP Spring 2019 Institute on Faculty and Student Well-Being and consented to participate in the study. Attendance at the meeting may have skewed data based on attendees’ interest in this particular subject.

CONCLUSION

Evaluating areas of worklife may help to identify job-person mismatches that may contribute to burnout among pharmacy academicians. Important steps to prevent burnout among pharmacy academicians might be targeted interventions such as mentoring programs, workload evaluations, transparency in the workplace, and encouraging hobbies outside of work. Future studies with a larger sample may help to identify additional predictive factors associated with areas of worklife in academic pharmacy.

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