Volunteerism Among Hospitalists and Non-Hospitalists at Academic and Community Medical Centers in North Carolina

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Background: Volunteerism is common in the United States, though less is known about volunteerism among medical professionals. We aimed to record and compare volunteer activities among hospitalists and non-hospitalists in academic and community centers. **Methods:** We created a structured 18-question survey asking respondents to quantify professional volunteer service within the preceding 12 months. Participants were medical providers at the University of North Carolina Hospitals (academic hospitalists, internists and pediatricians) and hospitalists at four other North Carolina hospitals. Main measures were number of hours spent volunteering in the previous 12 months and types of volunteer activities performed.

Results: There were 101 survey participants. When comparing hospitalists to nonhospitalists, there were no statistically significant differences in the number of hours spent volunteering (p=0.112). Those who were 34 years old or younger spent fewer hours volunteering than those 35-44 years old (p=0.082) or 45 years old or older (p=0.074). Those with 10 or more years of clinical experience spent significantly more hours volunteering (p=0.035). Males spent significantly more hours volunteering than females (p=0.036). Providers with children in the household spent significantly more hours volunteering than those without children (p=0.034). Providers at academic hospitals spent significantly more hours than those at community hospitals (p=0.011). **Limitations:** Data limited by potential recall bias associated with self-report and limited to survey respondents.

Conclusions: Hospitalists and non-hospitalist health professionals volunteer similar amounts. Volunteerism was significantly influenced by age, gender, clinical experience, presence of children in the household, and working in an academic center.

Introduction

Volunteerism is common in the United States, with 25.4% of U.S. population reporting some form of volunteering in a 2013 national survey¹. Volunteerism is associated with a number of improved health outcomes including lower rates of depression^{2,3} and hypertension⁴, and increased longevity⁵⁻⁷. In the general population, women, married persons, and those with children volunteer at higher rates¹. When stratified by age, thirty-five to 44 year-olds are most likely to volunteer, with volunteering lowest among 20-24 year olds¹. The majority of volunteer hours are spent with religious organizations, education/youth service organizations, and social or community service organizations¹.

Less is known about physician volunteerism. A 2012 Medscape survey reported that two-thirds of physicians participated in some form of volunteer activity in the previous year⁸. Among survey respondents, doing any form of volunteer work was associated with higher levels of happiness. Family physicians who most highly value benevolence and volunteerism have also been reported to be more satisfied in their clinical practice⁹. Despite the potential benefits to both community and the individual, physicians are less likely to volunteer than the general public and lawyers¹⁰. Reported barriers to volunteerism include time, malpractice and liability concerns, language barriers, lack of patient-provider continuity, and perceived lack of resources at volunteer medical facilities¹¹.

Hospital medicine is an emerging medical field and knowledge of how often and what type of volunteer activities hospitalist physicians undertake may be helpful to maximize professional development and job satisfaction. Our hospitalist group at the University of North Carolina (UNC), a tertiary academic center, is comprised of physicians certified in internal medicine, pediatrics, and combined internal medicine/pediatrics. The UNC physician staff in internal medicine and pediatrics also includes non-hospitalist physicians in those disciplines. Our medical community also includes several community hospitals with hospital medicine programs. In this report, we describe the frequency and type of professional volunteerism among hospitalists, general internists, and pediatricians practicing at five academic and community medical centers in North Carolina.

Methods

Survey Participants

We conducted a cross-sectional study of healthcare providers at five North Carolina hospitals. We included two academic centers, the University of North Carolina Hospitals (UNC) and Duke University Medical Center (DUMC), and three community hospitals WakeMed Hospitals (WMH), Rex Hospital (RH) and Duke Regional Hospital (DRH). Based on previously reported survey work^{6, 9, 10}, we created an 18-item anonymous questionnaire that asked respondents to quantitatively report demographic information and types and frequency of volunteer activities within the past 12 months (see appendix). We defined volunteer activities as those in which the person used his or her skills as a medical professional. The survey was distributed via an Internet polling website (Surveymonkey.com) in July of 2013. No incentives to complete the survey were offered, but all faculty in each department were asked to complete the survey. Respondents were asked to describe their professional volunteer activities. At UNC, survey participants included physicians from hospital medicine, along with nonhospitalist physicians from the Divisions of General Internal Medicine, and General Pediatrics and Adolescent Medicine. Responses from other hospitals were solely from hospitalists.

Outcomes

Measured outcomes included rates and hours of professional (medical student/resident teaching outside of normal working hours, volunteer medical clinics, international/domestic medical trips, medical advocacy, professional group involvement) and non-professional (school, nursing home, youth sports coach, organizational

fundraising, faith based, political advocacy, food distribution, community groups) volunteerism among survey respondents. We also report the different types of volunteer activities and demographics of survey respondents including years of experience, age and marital and child status.

<u>Analysis</u>

The mean number of reported volunteer hours by demographic characteristics and among hospitalist vs. non-hospitalist internists and pediatricians were tested for differences using student's t tests. Data were analyzed using Predictive Analytics Software (formerly SPSS), version 18.

Results

One hundred and one physicians completed the survey (70% response rate from UNC, 19% from other hospitals). The majority, 62% (n=63), reported having volunteered in the last 12 months. Fifty-nine percent reported participating in a professional capacity and 60% in a non-professional capacity within the prior 12 months. Table 1 describes the sample in more detail.

Table 1. Demographics of survey respondents

Characteristic		n = 101	%
Age	34 years or younger	37	36.6
	35-44 years	39	38.6
	45 years or older	25	24.8
Gender	Male	53	52.5
	Female	48	47.5
Specialty	Hospital medicine	64	63.4
	General internal medicine	20	19.8
	Pediatrics	16	15.8
Years in clinical practice	9 or less	60	59.4
	10 or more	41	40.6
Children in household	None	34	33.7
	1	15	14.9
	2 or more	52	51.5
Location	Academic	74	73.3
	Community	26	25.7
Volunteered in last 12 months?	Yes	60	59.4

Of those who reported professional volunteer activity, 38% (n=23) volunteered less than 20 hours, 30% (n=18) 20 – 50 hours, and 32% (n=19) more than 50 hours over the last 12 months. Forty-five percent (n=27) volunteered by teaching medical students or medical residents, 43% (n=26) worked at volunteer medical clinics, 30% (n=18) participated in organizing regional or national medical conferences, 25% (n=15) engaged in medical advocacy, and 12% (n=7) volunteered on international or domestic medical trips (Table 2). Among those reporting non-professional activity, 27% spent less than 20 hours, 33% spent 20-50 hours, and 40% spent more than 50 hours in the last 12 months. Table 3 further describes the breakdown of non-professional activity.

Table 2. Time spent volunteering in past 12 months and types of volunteer activities

		n = 60	%
Time spent volunteering past 12 months	< 20 hours	23	38
	20 – 50 hours	18	30
	> 50 hours	19	32
Type of volunteering	Teaching medical students/residents	27	45
	Medical clinics	26	43
	Conferences	18	30
	Medical advocacy	15	25
	International/domestic medical trips	7	12

Table 3. Time spent and type of non-professional volunteering in past 12 months

		n = 61	%
Time spent volunteering past 12 months	< 20 hours	17	27
	20 – 50 hours	20	33
	> 50 hours	24	40
Type of volunteering	School volunteerism	23	38
	Faith based	18	30
	Political advocacy	16	26
	Organizational fundraising	13	21
	Community groups	13	21
	Food distribution	12	20
	Youth sports coaching	11	18

There were no statistically significant differences in the number of hours spent volunteering when comparing hospitalists, general internists and pediatricians (Table 4). Those who were 34 or younger spent fewer hours volunteering in a professional capacity compared with those 35-44 or 45 or older. Those with 10 or more years of clinical experience, males, those with children were more likely to spend more time in volunteer activity. In both a professional and a non-professional capacity academic physicians spent significantly more hours volunteering.

Table 4. Hours spent volunteering in last 12 months by provider characteristics

Characteristic		n	Mean Hours*	Standard Deviation	t Statistic	p-value
Number of years in practice	9 or less	60	1.02	1.27	2.14	0.035
	10 or more	41	1.59	1.38		
Gender	Male	53	1.51	1.42	2.12	0.036
	Female	48	0.96	1.18		
Children in household	No	34	0.85	1.26	2.15	0.034
	Yes	67	1.45	1.34		
Professional capacity	Academic	74	1.46	1.34	2.59	0.011
	Community	26	0.69	1.19		
Non-professional capacity	Academic	73	1.66	1.5	2.20	0.031
	Community	26	.92	1.35		

* 0: < 20 hours

1: 20-50 hours

2: 51-80 hours

3: > 80 hour

Discussion

In our survey of five North Carolina hospitals, the majority of providers reported volunteering in a professional capacity within 12 months, most commonly by educating medical students and residents outside of paid duties. There were no statistically significant differences in hours of professional volunteerism among hospitalists, and non-hospitalist internists and pediatricians. Providers who had children in the household, who had more clinical experience, were male and worked at academic hospitals volunteered significantly more hours in a professional and a non-professional capacity than their respective counterparts. Those 34 years or younger showed a trend toward less time volunteering than older providers.

The rate of volunteerism we identified was significantly higher than the 25% reported in the general population¹ and among internists performing community volunteering¹⁰, though was very similar to the volunteerism rate reported in a broader physician survey⁸.

Similarly, while volunteerism rates in the general population are reported as higher for those with children less than 18 years old¹, our survey respondents with children reported more volunteer hours. In contrast, the general population survey reported that females volunteered more than males¹, while our study found the opposite. Physician volunteers likely differ substantially from the population as a whole. For example, professional women may not feel as able to volunteer due to competing demands. Similarly, in the physician population, being older and having children in the household may be markers of financial and career stability that may afford more opportunity to volunteer. We did not survey amount of indebtedness, although one might hypothesize that national trends in increased debt might tend to reduce volunteerism among young professionals.

The finding that academic versus non-academic physicians had a higher rate of volunteerism is interesting. Academic medical centers typically provide practicing physicians with more student and resident contact. This opportunity could lead to selection bias among providers who practice at academic centers toward those who are more active in the community. The mission of the academic hospital where the majority of respondents work includes service to the people of North Carolina. Another possible mechanism is the increased size of academic centers, which could afford greater opportunity to volunteer more easily.

Limitations of our study include the self-reported nature of the data and relatively low survey response rate from community physicians. Those who completed the survey may have had more interest in volunteering as opposed to those who did not, thus introducing bias. In addition, self-reported responses are subject to recall bias. These limitations are balanced against the strengths of multi-center and multi-specialty participation.

In summary, our study reports characteristics of physician professional volunteerism from five North Carolina hospitals, with emphasis on providers in hospital medicine, a relatively new specialty. Understanding these trends will be helpful to guide and mentor residents and early career faculty, particularly those with an interest in community service, and to guide conversation on how to encourage this valuable service. We hope these data can also open conversation regarding volunteerism as a means of professional and faculty development. In addition, further study is warranted regarding women in medicine, career and family life balance, and indebtedness.

Notes

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Appendix – Survey

- 1. How old are you < 30, 30-34, 35-39, 40-44, 45-50, >50
- 2. Sex Male Female
- 3. Professional Title MD/DO, NP, PA Other (please specify)
- 4. Where do you practice? Duke University Medical Center Duke Regional Hospital Duke Raleigh Hospital Rex Healthcare UNC Hospitals WakeMed Health & Hospitals Durham VA Medical Center
- 5. Specialty/area of focus: Internal Medicine Hospital Medicine Program, General Internal Medicine, Internal Medicine/Pediatrics Hospital Medicine Program, Internal Medicine/Pediatrics, Pediatrics, Hospital Medicine Program Pediatrics
- 6. Number of years in clinical practice, not including residency/training: 0-4, 5-9, 10-14,15-20, > 20
- 7. Number of children (< 18 years old) in your household 0, 1, 2-3, >3
- 8. Average number of hours spent in clinical work per week since 7/1/2012 < 10, 10-20, 21-30, 31-40, 41-50, >50
- 9. Since July 1st of 2012, have you participated in any volunteer activities? Yes No
- 10. What type(s) of PROFESSIONAL volunteer work have you done since 7/1/2012? Check all that apply. (Professional volunteer work includes unpaid activities in which you primarily use your skills as a medical doctor or healthcare provider.)

Medical student/resident teaching outside of normal working hours, Volunteer medical clinics, International/domestic medical trips, Medical advocacy (speaking engagements, political groups, etc.), Regional or national professional group involvement Other (please specify)

- 11. Since 7/1/2012, on how many separate days have you volunteered in a PROFESSIONAL capacity? <5, 5-9, 10-14, 15-20, >20
- 12. Since 7/1/2012, approximately how many hours have you volunteered in a PROFESSIONAL capacity <20,
- 20-50, 51-80, >80
- 13. What type(s) of NON-PROFESSIONAL volunteer work have you done since 7/1/2012? Check all that apply. (NON-PROFESSIONAL volunteer work includes unpaid activities in which you do NOT primarily use your skills as a medical doctor or healthcare provider.)

School volunteerism, Youth sports coaching, Nursing home volunteerism, Organizational fundraising, Faith-based volunteerism (ex: be an usher, greeter or minister), Political advocacy, Collect, prepare, distribute or serve food, Homeowners associations, event organizations, other community groups Other (please specify)

- 14. Since 7/1/2012, on how many separate days have you volunteered in a NON-PROFESSIONAL capacity?
- <5, 5-9,10-14, 15-20, >20
- 15. Since 7/1/2012, approximately how many hours have you volunteered in a NON-PROFESSIONAL capacity?
- <20, 20-50, 51-80, >80
- 16. How did you initially become involved in your volunteer activities? Check all that apply. Asked to participate by work colleague, Asked to participate by friend, Independently sought out opportunity, Initial work was obligatory but continued on as volunteer, Other (please specify)
- 17. How often do work commitments limit the amount of volunteer work that you do? Always, Sometimes, Rarely, Never
- 18. How often do family commitments limit the amount of volunteer work that you do? Always, Sometimes, Rarely, Never
- 19. How often does lack of time for other reasons limit the amount of volunteer work that you do? Always, Sometimes, Rarely, Never
- 20. How often do financial concerns (ex. student debt, mortgage, etc) limit the amount of volunteer work that you do? Always, Sometimes, Rarely, Never
- 21. How often does a lack of financial incentive to volunteer limit the amount of volunteer work that you do? Always, Sometimes, Rarely, Never
- 22. How often do malpractice/litigation concerns limit the amount of volunteer work that you do? Always,

Sometimes, Rarely, Never

23. How often does the feeling that your primary occupation is significant community service limit the amount of volunteer work that you do?

Always, Sometimes, Rarely, Never

- 24. What else prevents you from doing more volunteer work? Please briefly describe.
- 25. Overall satisfaction with your current job? Extremely satisfied, Satisfied, Neutral, Unsatisfied, Extremely unsatisfied