

UVM ScholarWorks

Happy Feet: Podiatric Needs of the Burlington Homeless Population

Item Type	Presentation
Authors	Chilakamarri, Priyanka;Gill, Gurbinder;Kristiansen, Karl;Rayikanti, Benjamin;Sun, Michael;Thomas, Whitney;Pasanen, Mark;Paradiso, Julia;Lenz-Watson, Aurora
Download date	2026-06-17 01:31:28
Item License	http://creativecommons.org/licenses/by-nc/3.0/
Link to Item	https://hdl.handle.net/20.500.14849/965

Happy Feet: Podiatric Evaluation of the Burlington Homeless Population

Chilakamarri P.¹, Gill G.¹, Kristiansen K.¹, Rayikanti B.¹, Sun M.¹, Thomas W.¹, Pasanen M.¹, Paradiso J.², Lentz A.²

¹ University of Vermont College of Medicine, Burlington VT; ²Committee on Temporary Shelter, Burlington, VT

Introduction

- Homelessness presents a unique challenge to maintaining personal health and addressing medical concerns [1]. Some health issues include: substance abuse, cardiovascular disorders, mental health, infection, and hypothermia [2].

- These issues pose a significant public health burden in regards to both cost and the risks associated with certain diseases [3,4].

- Due to many hours spent on their feet, leg and foot health is especially important for the homeless. Maintaining foot health ensures overall health and access to employment and housing [3].

- If common foot issues are not identified early, they can lead to chronic pain, poor function or disability. This places individuals at a greater risk of homelessness [5,6].

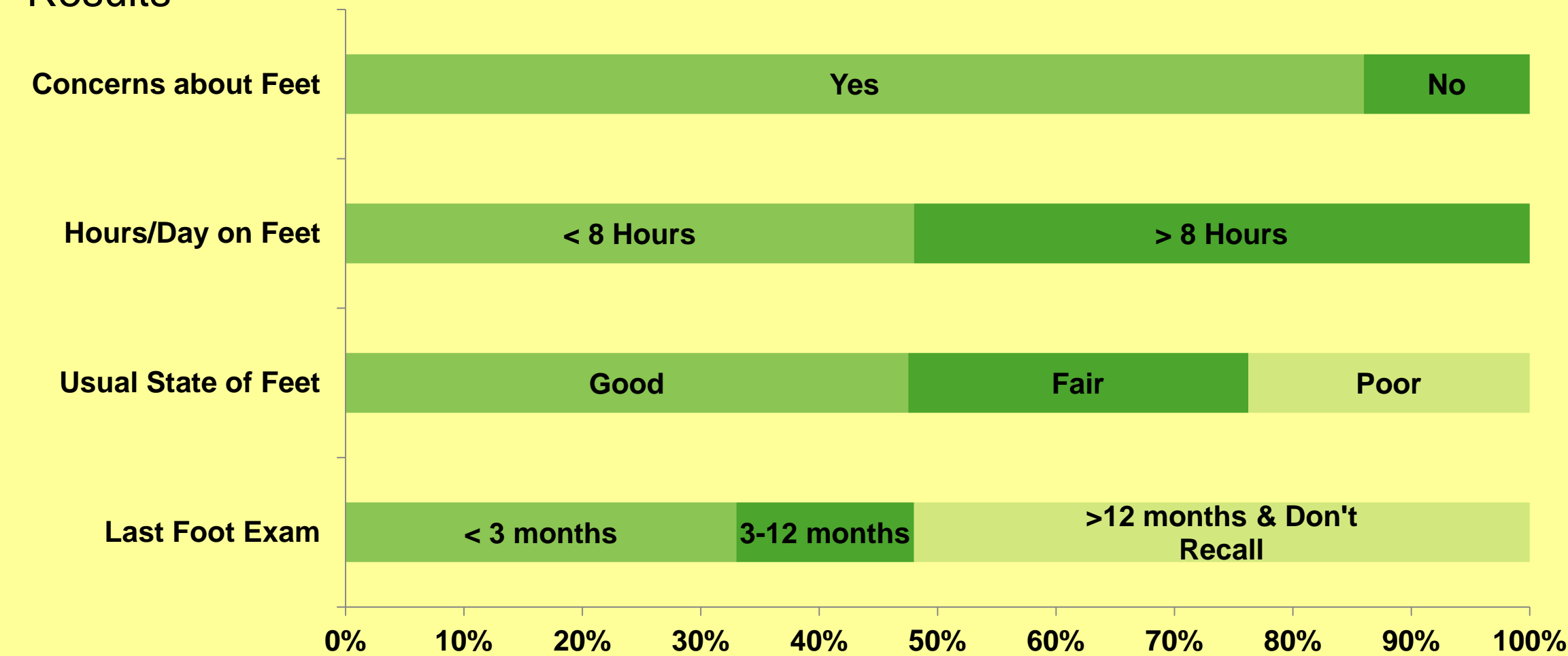
- While it is important to understand the factors influencing foot health in homeless individuals, few studies have done so [3]. This study attempts to characterize the podiatric needs and concerns of the homeless population in Burlington.

Method

Twenty-one homeless individuals residing at the Committee on Temporary Shelter (COTS) Waystation in Burlington, Vermont were offered free foot screenings by second year University of Vermont medical students as part of a public health project. Participants were offered a free pair of socks and a granola bar for attending. There were no exclusion criteria.

Foot exams included musculoskeletal, neurological, circulatory and dermatologic evaluations. In addition, the guests' medical and social history was obtained, as well as information to gauge their knowledge of proper foot care and expectations from the session. Clinics were held from September–November 2013.

Results



Photos courtesy of Raj Chawla, Medical Photography, University of Vermont College of Medicine

Conclusion

Overall, we found that podiatric issues are a prevalent concern in the homeless community of Burlington. We believe that the amount of time spent on their feet, lack of access to foot exams, and preexisting health problems are all factors contributing to their concern. Foot care education, consistent foot exams, and better care of chronic health conditions are potential areas for public health intervention. Providing foot exams may not only identify physical problems, but also alleviate stress and anxiety, and thus improve well-being and outlook. We hope the factors we identified as contributors to the podiatric needs of the homeless population can be explored in future studies.

A special thanks to Mark Charlson, M.D. and Stephen Merena, D.P.M. for volunteering their time for this project.

Discussion

- 62% of guests presented with complaints in one or both feet and 71% had abnormal physical exam findings. While many homeless individuals are aware of their foot problems, others may be under-recognizing their issues.

- 24% of the individuals wore clean socks and 29% practiced appropriate nail care. Perhaps improving access to clean socks and/or nail care instruments could help lower the prevalence of some specific foot problems such as fungal infections or deformed toenails.

- 10% of the individuals reported doing nothing to take care of their feet, while the remainder said they showered regularly to keep their feet clean. Since the majority of the individuals have access to a shower, lack of foot hygiene is likely unrelated to the availability of shower facilities.

- Considering that 48% of the COTS guests reported being on their feet >8hrs/day, it is concerning that 52% could either not remember their last foot exam or remember it being more than a year ago. Further, 24% deemed the state of their feet to be poor; perhaps this number can be lowered with more regular foot exams.

- 33% of the individuals reported an illness in one or more of the following categories: diabetes, heart health, and circulation. Since these illnesses have a strong correlation with foot health and overall wellbeing, improving these illnesses may benefit the homeless.

References

1. Busen NH, Beech B. A collaborative model for community-based health care screening of homeless adolescents. *J Prof Nurs.* 1997;13(5):316-24.
2. Włodarczyk D, Prentice R. Health issues of homeless persons. *West J Med.* 1988;148(6):717-9.
3. Chen B, Mitchell A, Tran D. Podiatric health needs of homeless populations as a public health concern. *J Am Podiatr Med Assoc.* 2012;102(1):54-6.
4. Robbins JM, Roth LS, Villanueva MC. "Stand down for the homeless". Podiatric screening of a homeless population in Cleveland. *J Am Podiatr Med Assoc.* 1996;86(6):275-9.
5. Anakwenze OA, Milby AH, Gans I, Stern JJ, Levin LS, Wapner KL. Foot and ankle infections: diagnosis and management. *J Am Acad Orthop Surg.* 2012;20(11):684-93.
6. Sartor CD, Watari R, Pássaro AC, Picon AP, Hasue RH, Sacco IC. Effects of a combined strengthening, stretching and functional training program versus usual-care on gait biomechanics and foot function for diabetic neuropathy: a randomized controlled trial. *BMC Musculoskelet Disord.* 2012;13:36.