

# Effectiveness of Social Risk Screening in Ambulatory Clinics Indicates Potential Setting for Future Interventions

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## Introduction

Professional societies currently recommend providers in all healthcare settings screen patients for social risk factors and address unmet social needs. Studies demonstrate that many at risk populations such as those who are homeless, may utilize certain services such as the emergency room over ambulatory care. It is unclear if patients with certain social risk factors utilize ambulatory clinics for care. To date, little research is available to quantify if ambulatory practices are adequately capturing vulnerable populations with social risk factors at the frequency seen in the general population. This study compares the prevalence of social risk factors seen in the ambulatory care setting compared to the general population of Connecticut.

## Methods

**Timeframe:** September 13, 2021 to May 6, 2022

**Study Population:** Screenings were conducted in the outpatient setting at 3 ambulatory clinics located in rural, suburban, and urban areas of Connecticut that mirrored the general population.

**Data Collection:** Volunteers from the University of Connecticut Health Leaders (UChL) program approached and screened patients while they waited in the waiting room or the exam room for their provider. All patients aged 18-years or older, who were able to provide consent, were eligible for screening. Volunteers screened patients for social risk factors using the Protocol for Responding to and Assessing Patients' Assets, Risk, and Experiences assessment tool. Upon completion of the screening, volunteers determined patients' social needs by offering them resources based on the social risk factors the screening identified.

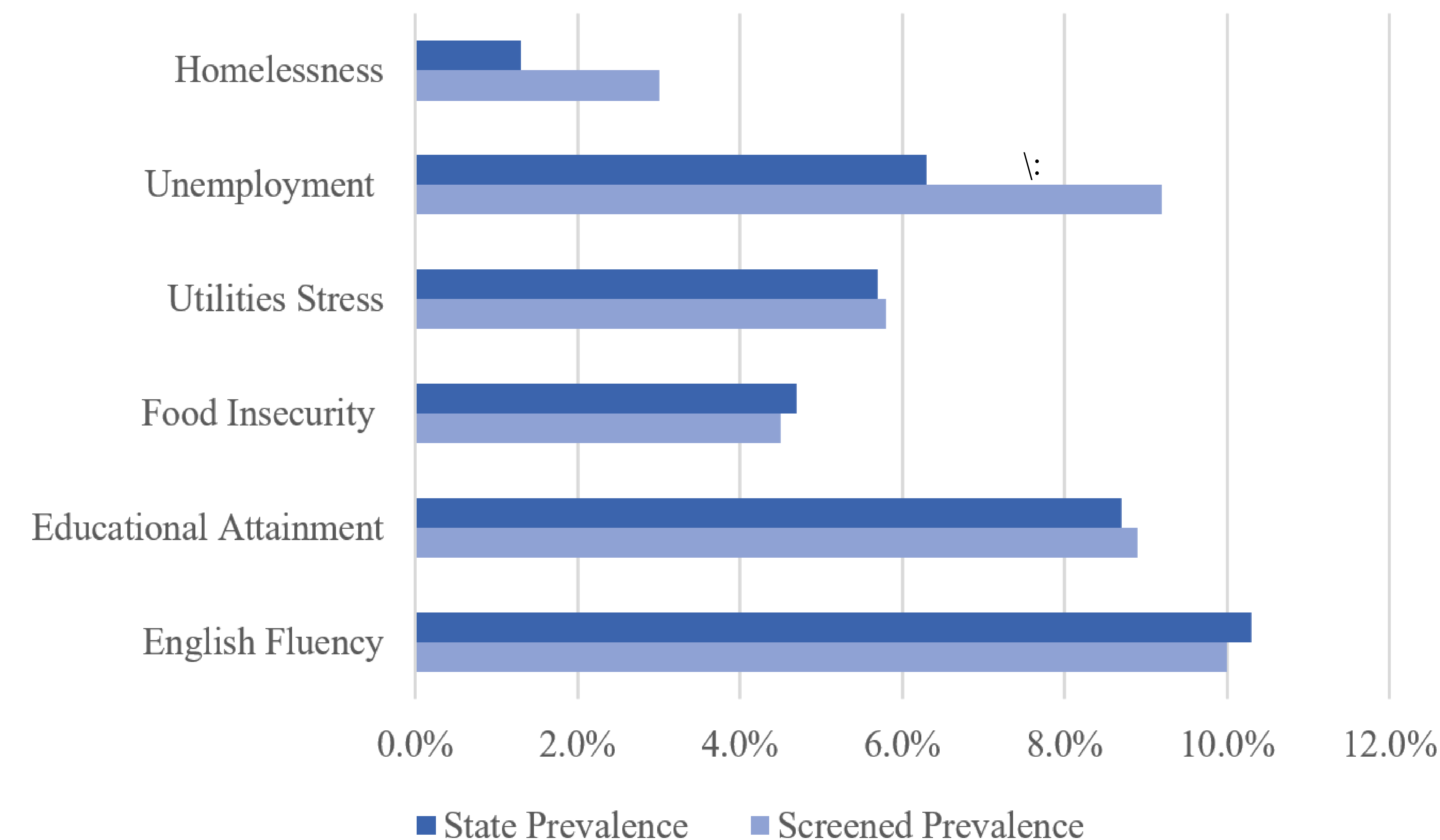
**Analysis:** To determine the screening's effectiveness, the measured prevalence of unemployment, food insecurity, low educational attainment (no GED equivalent), utilities stress, homelessness, and decreased English fluency was compared to the state-wide prevalence. Investigators determined the state-wide prevalence of utilities stress and homelessness through finding the proportion of the population that received CT Energy Assistance Program benefits or contacted the CT Coordinated Access Network in need of housing assistance. Government data published between 2019 and 2021 provided the prevalence of all other factors. Researchers compared the prevalence using Chi-Square Tests of Independence with a p-value of <0.05.

## Results

Volunteers approached 2,334 patients and 2,150 (92.1%) consented to screening. Analysis found no significant difference between the state-wide prevalence of education attainment (8.9% vs 8.7%,  $p = 0.79$ ), utility stress (5.8% vs 5.7%,  $p = 0.87$ ), food insecurity (4.5% vs. 4.7%,  $p = 0.58$ ), and decreased English fluency (10.0% vs 10.3%,  $p = 0.61$ ) and the prevalence of those factors among patients screened. Patients screened had a significantly higher prevalence of unemployment (9.2% vs 6.3%,  $p < 0.05$ ) and homelessness (3.0% vs 1.3%,  $p < 0.05$ ) compared to the state overall.

Social Risk Factor	Screened Prevalence	State Prevalence	P-value
English Fluency	10.0%	10.3%	0.61
Educational Attainment	8.9%	8.7%	0.79
Food Insecurity	4.5%	4.7%	0.58
Utilities Stress	5.8%	5.7%	0.87
Unemployment	9.2%	6.3%	0.0001
Homelessness	3.0%	1.3%	0.0001

**Table 1:** Prevalence of low English fluency, low educational attainment, food insecurity, utilities stress, unemployment, and homelessness among those screened and state-wide.



**Figure 1:** Comparison of English fluency, low educational attainment, utilities stress, food insecurity, homelessness, and unemployment between those screened by UChL and reported by the state illustrating statistically significant differences.

## Conclusion

Patients screened in the ambulatory setting experienced similar prevalence among low educational attainment, English fluency, utilities stress, and food insecurity compared to Connecticut population. This study identified a higher prevalence of patients experiencing homelessness and unemployment compared to the state-wide average. These findings argue that those with unmet social needs are accessing ambulatory care but those who are unemployed and homeless are seen more frequently. These results argue that screening in the ambulatory setting offers an adequate site for targeted intervention in addressing social needs as prevalence is equal to or greater than Connecticut averages.

## References

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## Acknowledgements

Special thanks to the following people for their contributions to our program and their continued support: Dr. Kenia Mansilla-Rivera, Dr. Rebecca Andrews, Mr. Christopher Watkins, and Mrs. Kahdija Poitras-Rhea. Thank you also to the UChL leadership team and volunteers who made this research possible.