Prevalence of Liver Cirrhosis and Its Association With Obesity Among Mexican Americans: An Evidence Synthesis

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Introduction

Chronic liver disease is the 6th and 7th leading cause of death in Hispanic men and Hispanics, respectively.[1] In contrast to other causes of liver disease, the prevalence of nonalcoholic liver disease has been growing as is diabetes and obesity.[2]

Objective

There is a paucity of data regarding the prevalence of cirrhosis for Mexican Americans in South Texas. The aim of this evidence synthesis is to investigate the prevalence of cirrhosis in Hispanic populations and its relationship with obesity.

Methods

PubMed was used to perform a thorough literature search on September10, 2020. The terms “liver cirrhosis” and “obesity” were combined with the subheading's “epidemiology,” “genetics,” and “complications.” Five remained after applying criteria.

Results

In a cohort of Hispanic patients in South Texas, the prevalence of cirrhosis/fibrosis was estimated to be 3.54%, and central obesity was an independent risk factor for cirrhosis/advanced fibrosis ($p=0.04$).[3] Moderate to severe fibrosis has a statistically significant higher average BMI compared to those with none to mild fibrosis ($p<0.001$).[4] A study in multiple Mexican regions found increased mortality from cirrhosis with statistically significant findings in the South and North regions ($p<0.0001$).[5] Obesity only increased in the Central and Mexico City regions.[5]

Discussion

Obesity was an independent risk factor for cirrhosis and 65.3% of cirrhosis and advanced fibrosis cases may be attributable to obesity alone in a cohort of Hispanic patients.[3] Since South Texas has one of the highest rates of obesity in the US, this population is susceptible to high rates of liver disease, obesity and mortality.

Conclusions

Hispanic patients that are obese have an increased risk of liver disease and associated mortality.[3–6] These study findings are limited by the paucity of relevant research and variable methodology of the studies. Further research is needed to evaluate the impact of obesity on liver disease for this population.

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