The Reddy Internal Medicine Lab Student Program at Texas Tech University Health Sciences Center (TTUHSC) provides high school and university students with valuable STEM-evention, and related

dementias. Prioritizing diversity and inclusion, the program specifically targets Hispanic communities in West Texas, aiming to offer hands-on research opportunities to young Hispanic scholars while serving as a model for other research labs. Recognizing the vital need for research in healthy aging and dementia prevention, especially in underrepresented communities, the program emphasizes engaging Hispanic and female students in STEM. Partnerships with local high schools, such as Estacado High School and the Talkington School for Young Women Leaders, will facilitate student involvement in animal research using mouse models, co-authoring journal articles, and presenting findings at the Hispanic Health Expo. To implement the program, we will establish partnerships with local high schools, community colleges, and organizations like Latino Lubbock to recruit Hispanic students. A detailed curriculum focused on healthy aging -on research and

opportunities for co-authoring journal articles. We will engage experienced mentors from TTU,

Sehar, U., Mukherjee, U., Khan, H., Brownell, M., Malhotra, K., Culberson, J., ... & Reddy, P. H. (2024). Effects of Sleep Deprivation on Brain Atrophy in Individuals with Mild Cognitive Impairment and Alzheimer's Disease. *Ageing Research Reviews*, 102397.

Mukherjee, U., Sehar, U., Brownell, M., & Reddy, P. H. (2024). Mechanisms, Consequences and Role of Interventions for Sleep Deprivation: Focus on Mild Cognitive Impairment and

. Ageing Research Reviews, Accepted.