

TN's Economic Growth Remains Solid

TGFOA

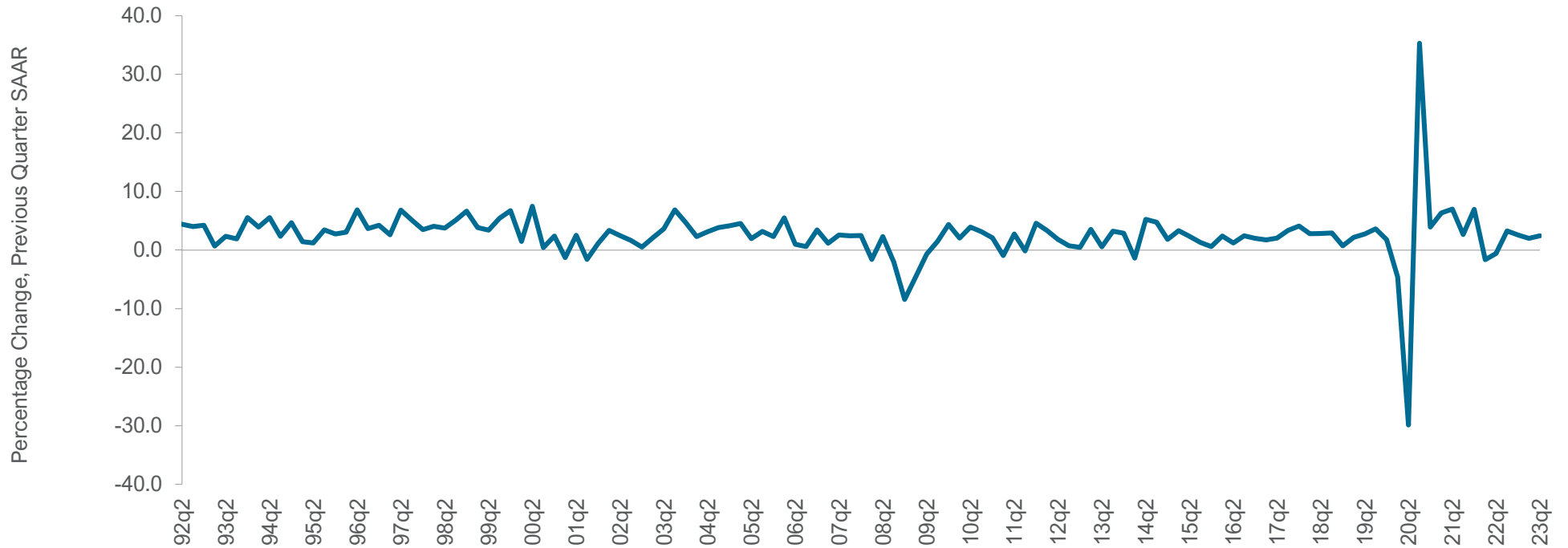
Bill Fox, Special Advisor
UTK Chancellor
October 2, 2024



THE UNIVERSITY OF
TENNESSEE
KNOXVILLE



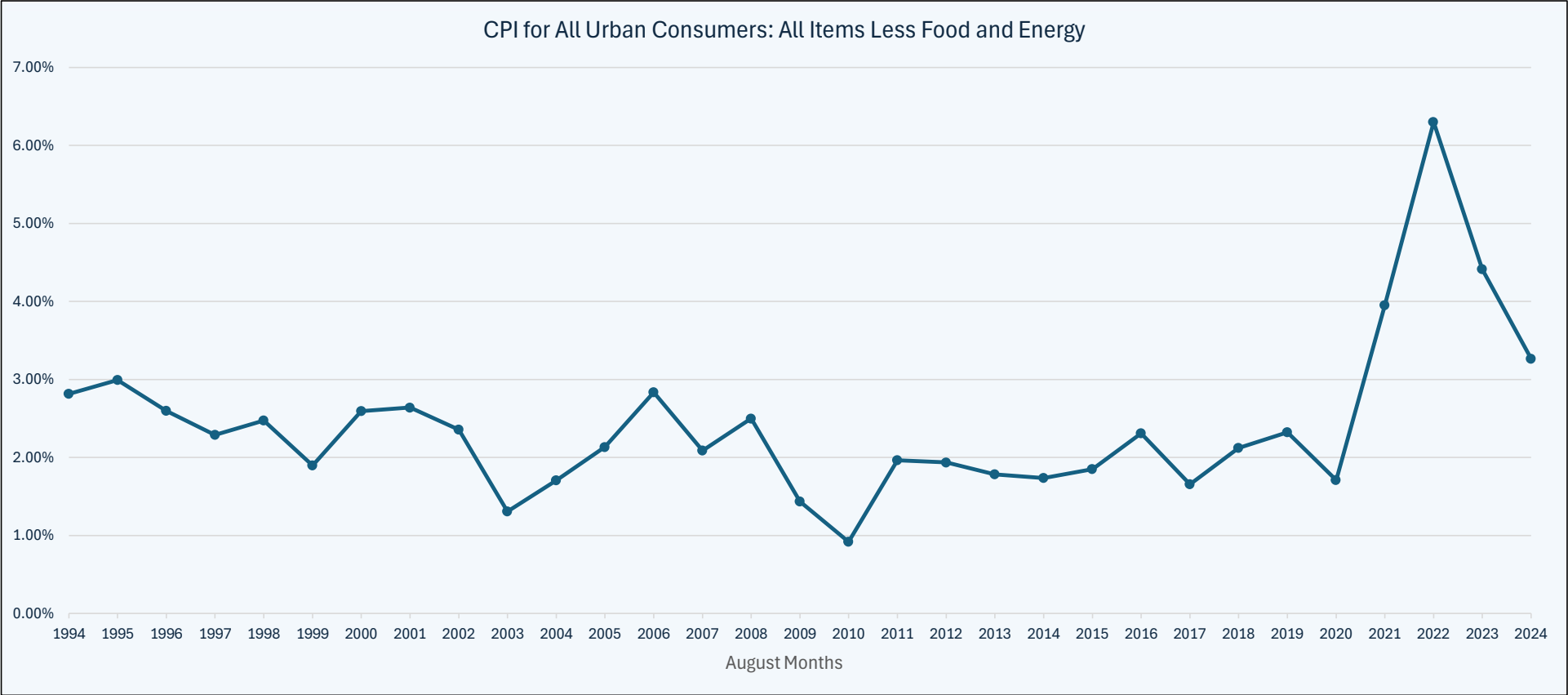
GDP Has Grown Strongly Since Covid, Hovering Around Potential Growth



Source: BEA



Inflation Rate Has Fallen Dramatically from Its Covid Peaks, but Remains Above FED target



Factors Affecting the Economy

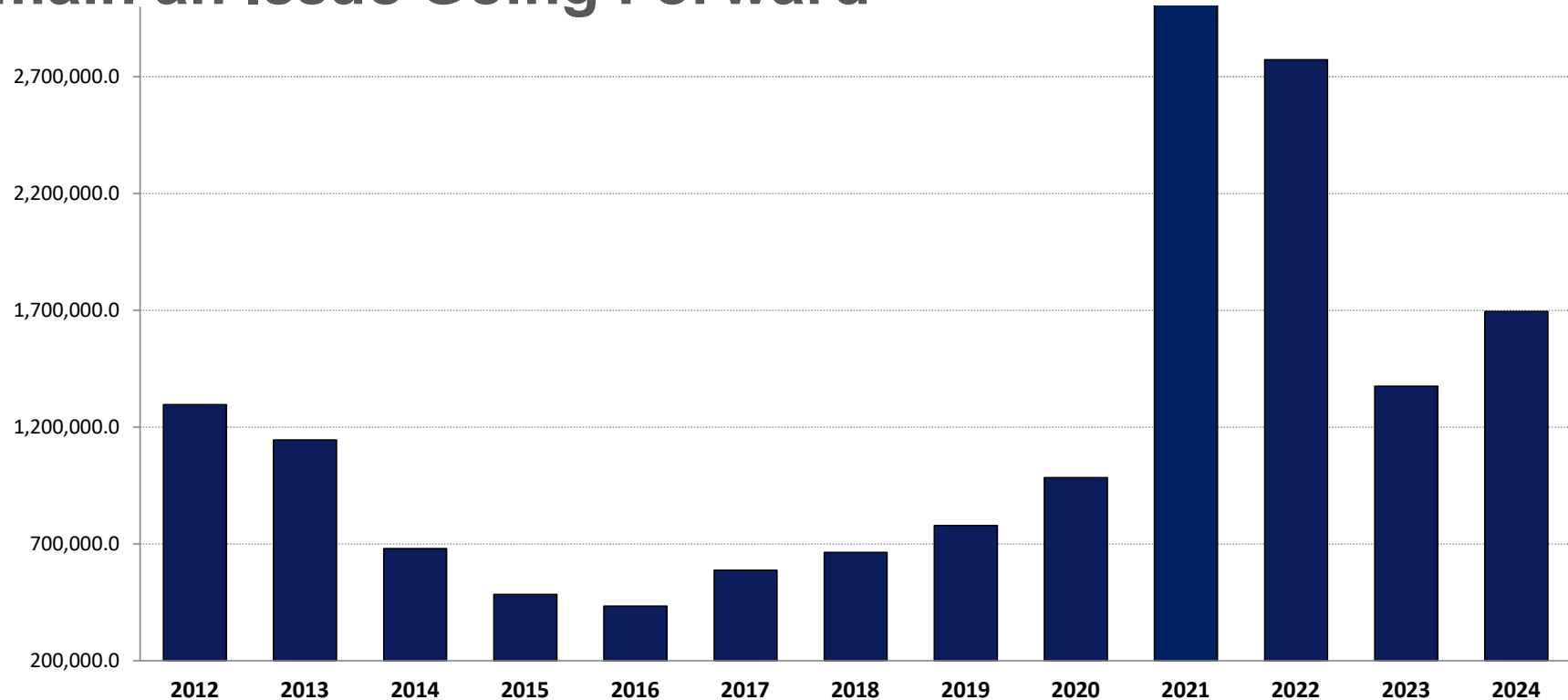
Sources of Strength

- Consumer Spending
- Equity Markets
- Employment

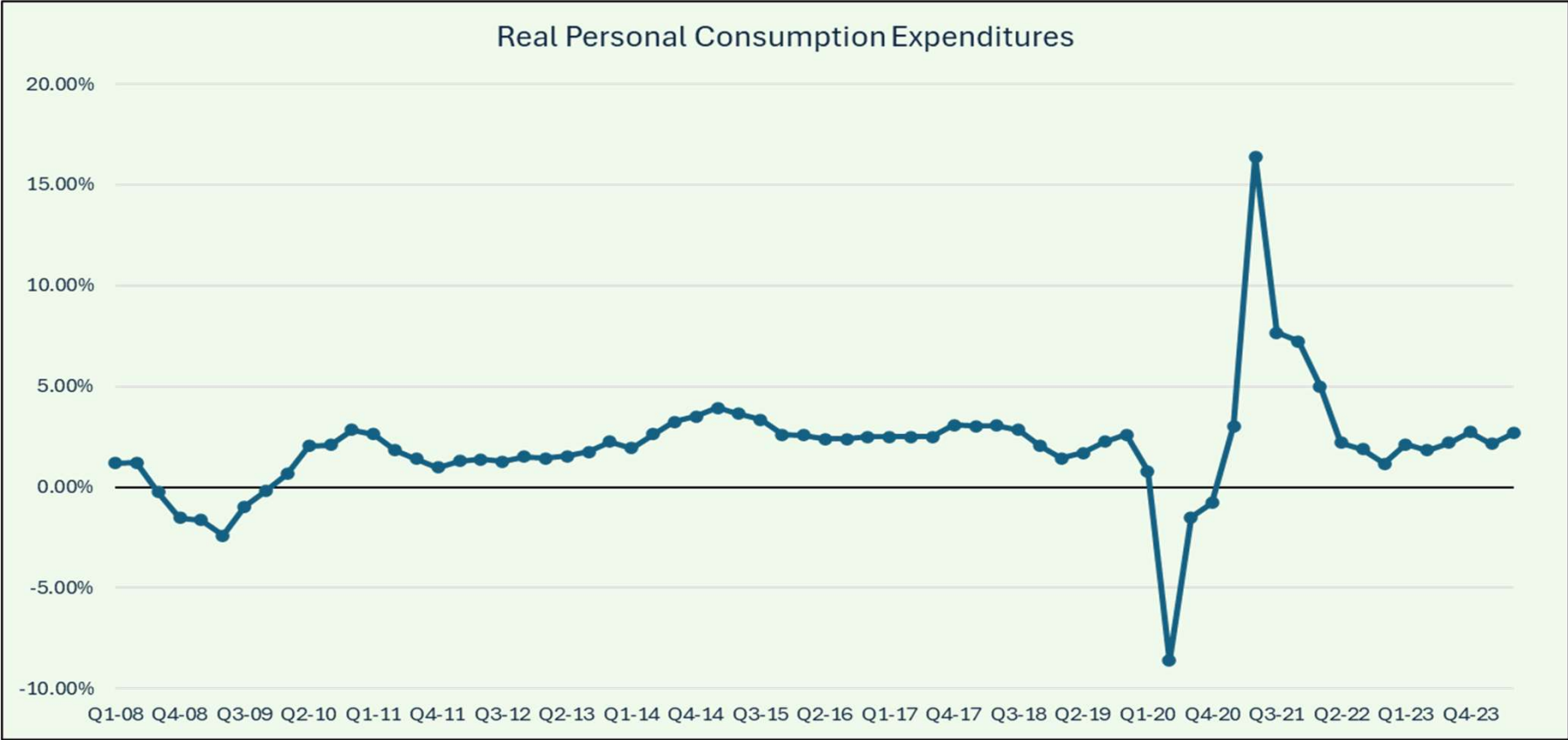
Potential Shocks

- Federal Deficits
- Inflation
- Interest rates
- Election
- Geopolitical risks, Oil Prices

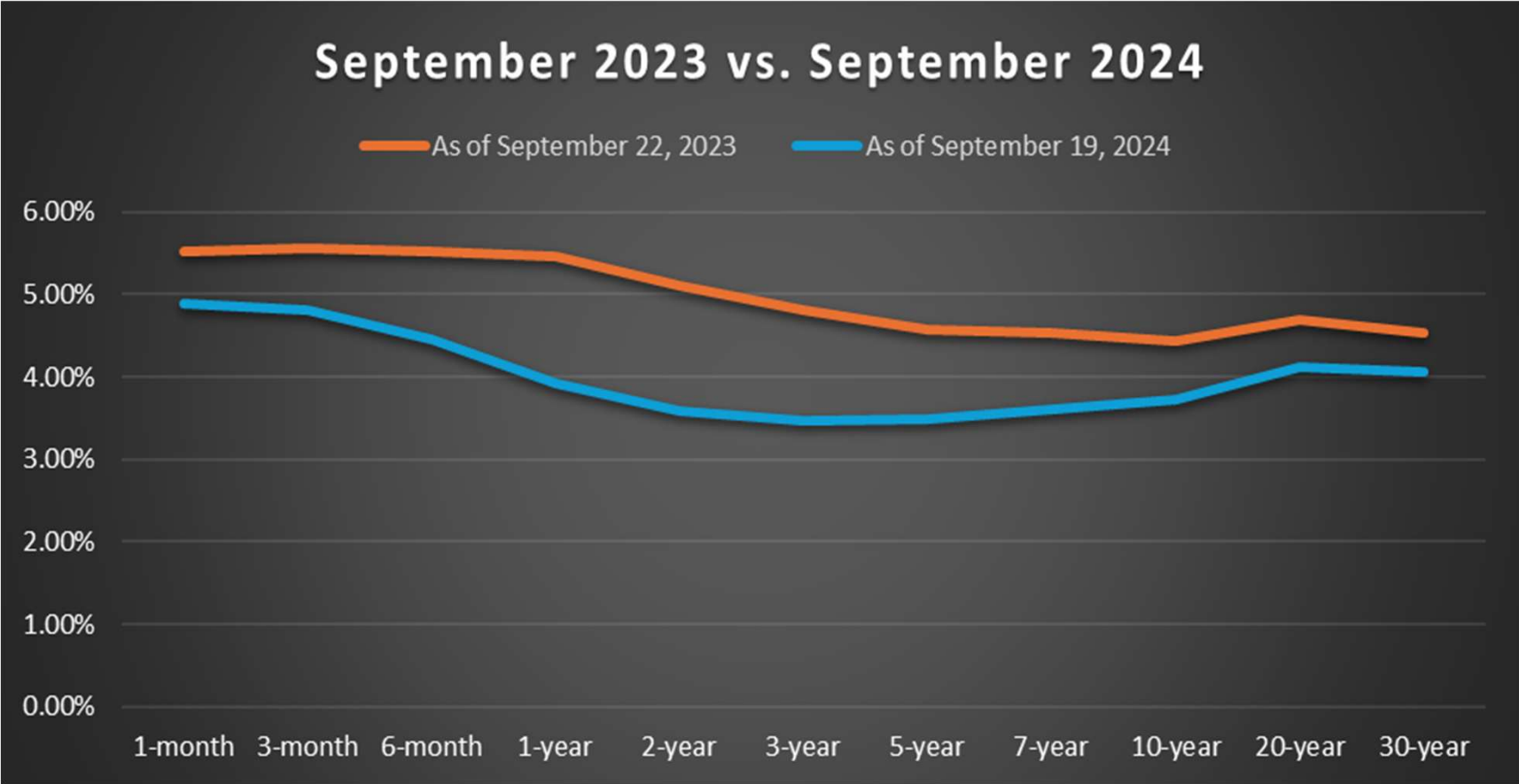
Federal Deficits Fueled the Economy During Covid, but Remain an Issue Going Forward



Consumer Spending Has Sustained the Post Covid Economy



Interest Rates of All Maturities are Lower than One Year Ago

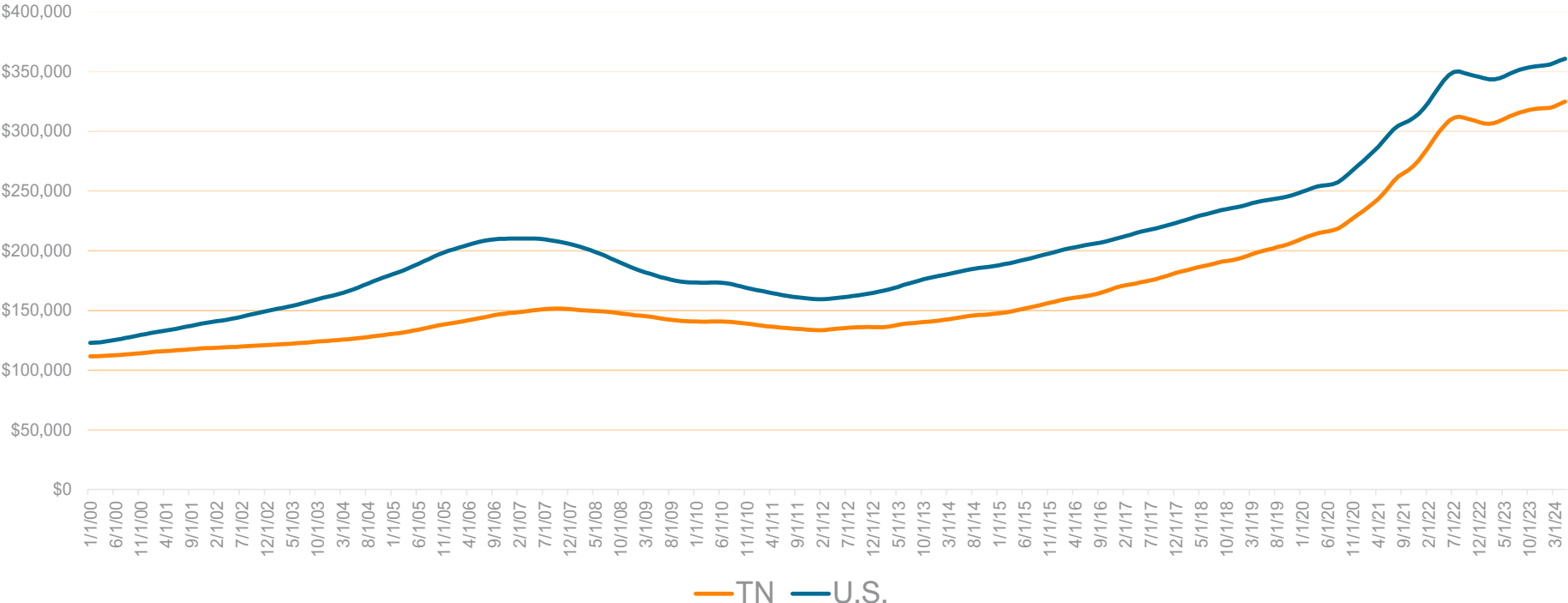


Housing Starts in the U.S. Have Not Kept Pace with Population Growth



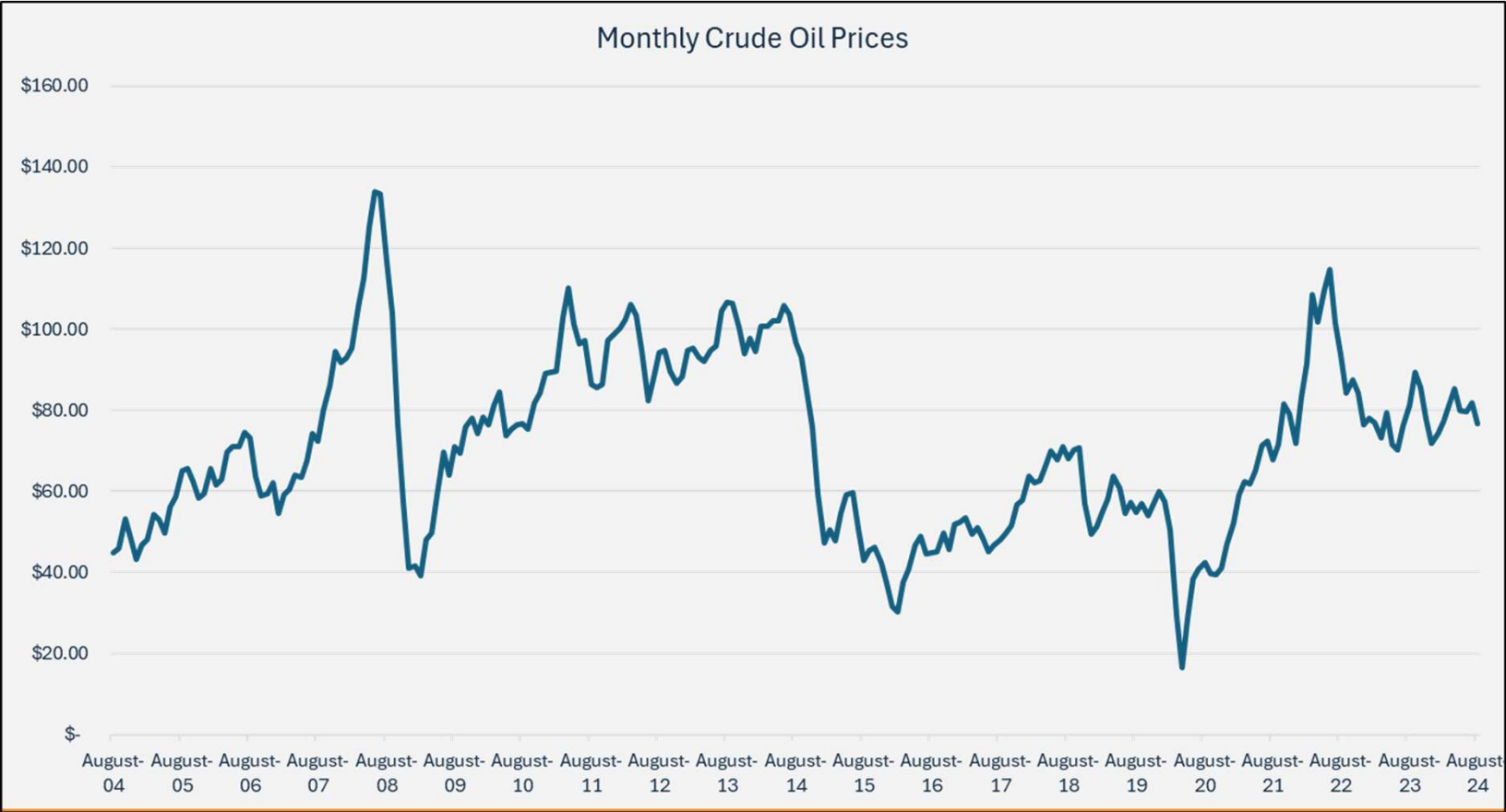
Sources: Bureau of Economic Analysis, U.S. Census Bureau, and U.S. Department of Housing and Urban Development

Home Values in TN and the U.S. Have Been on the Rise

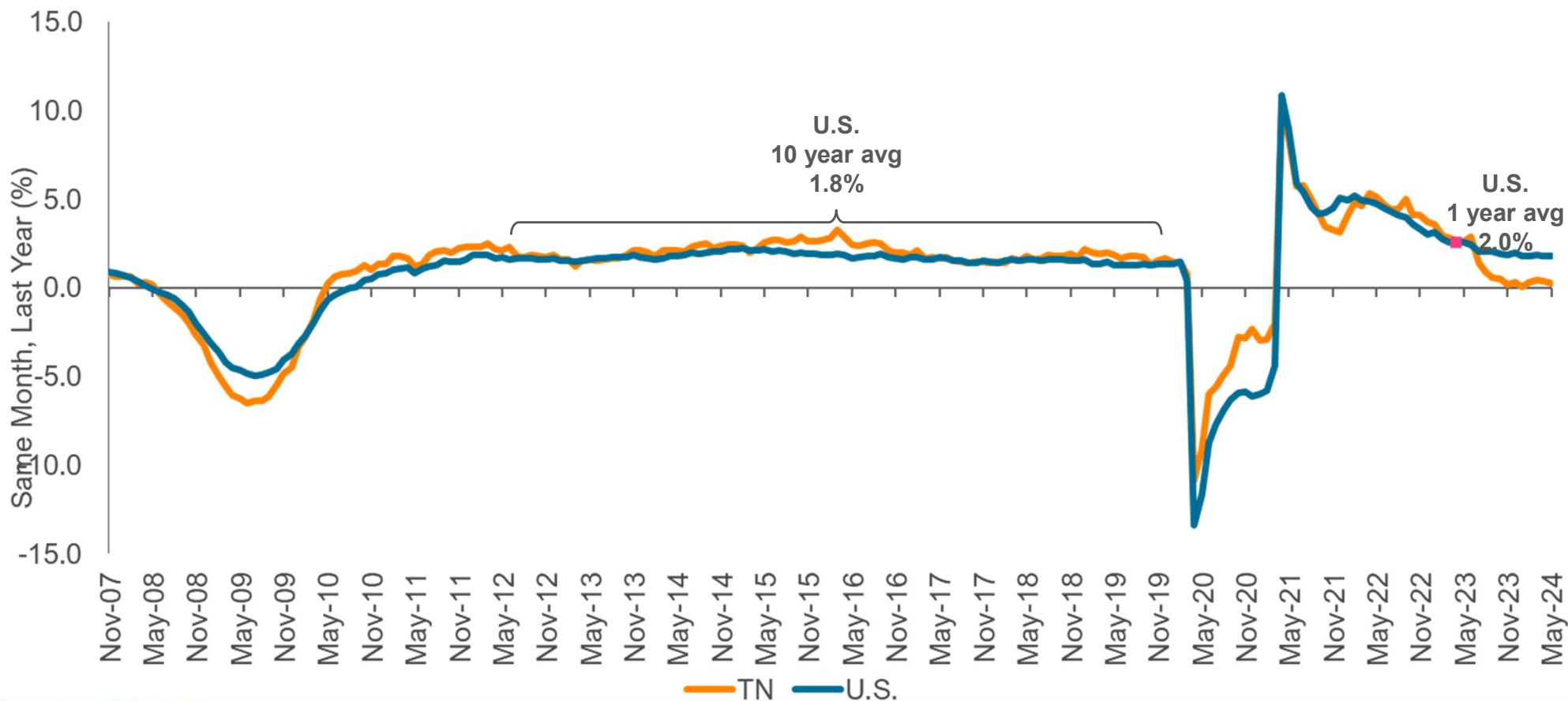


Source: Zillow

Oil Prices have Fallen From Covid Peaks, but can Create Shocks

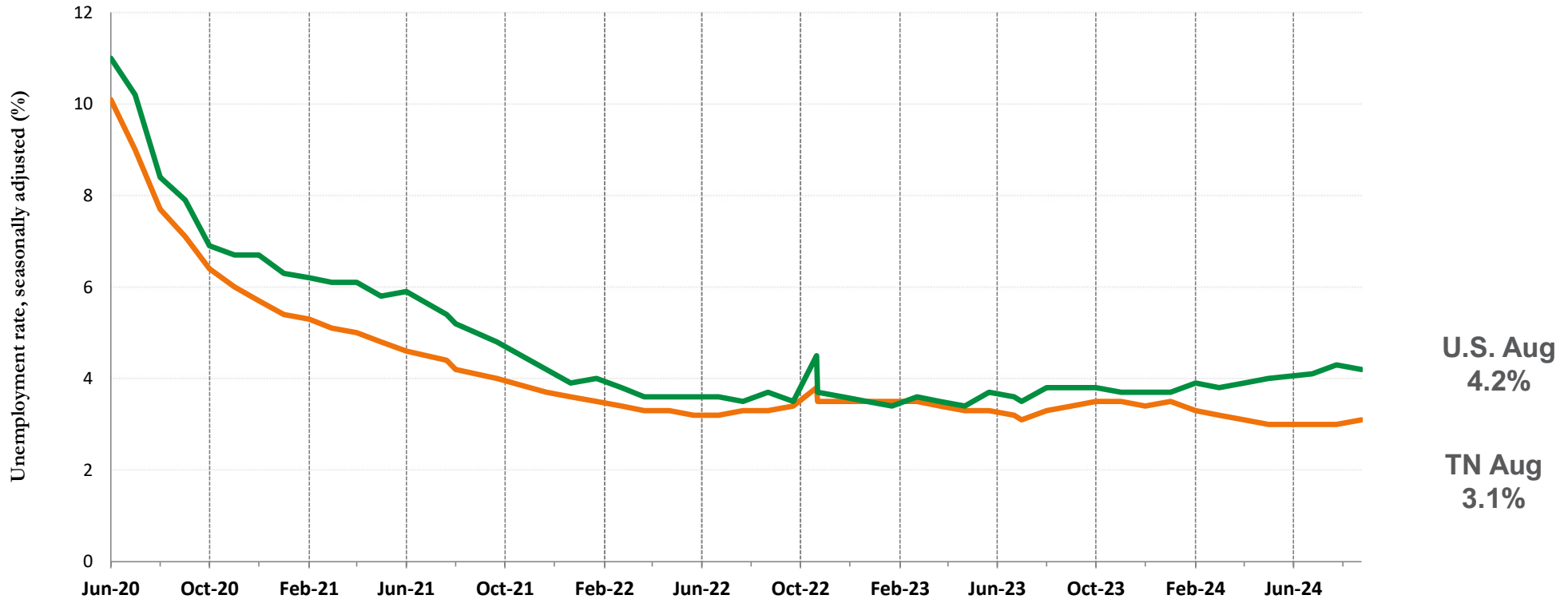


U.S. Employment Growth is Slowing, but Remains at Levels Consistent with a Growing Economy



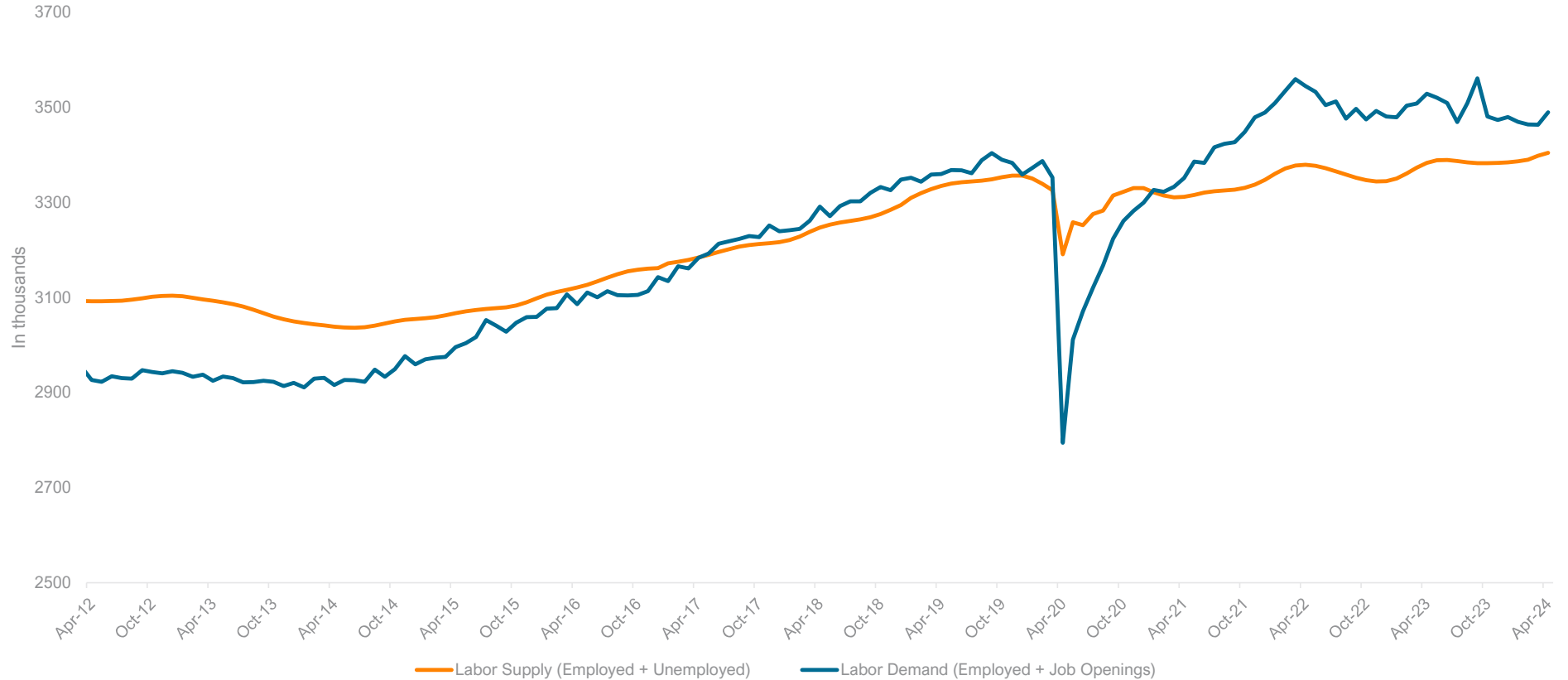
Source: Bureau of Labor Statistics

Tennessee's Unemployment Rate Remains Very Low



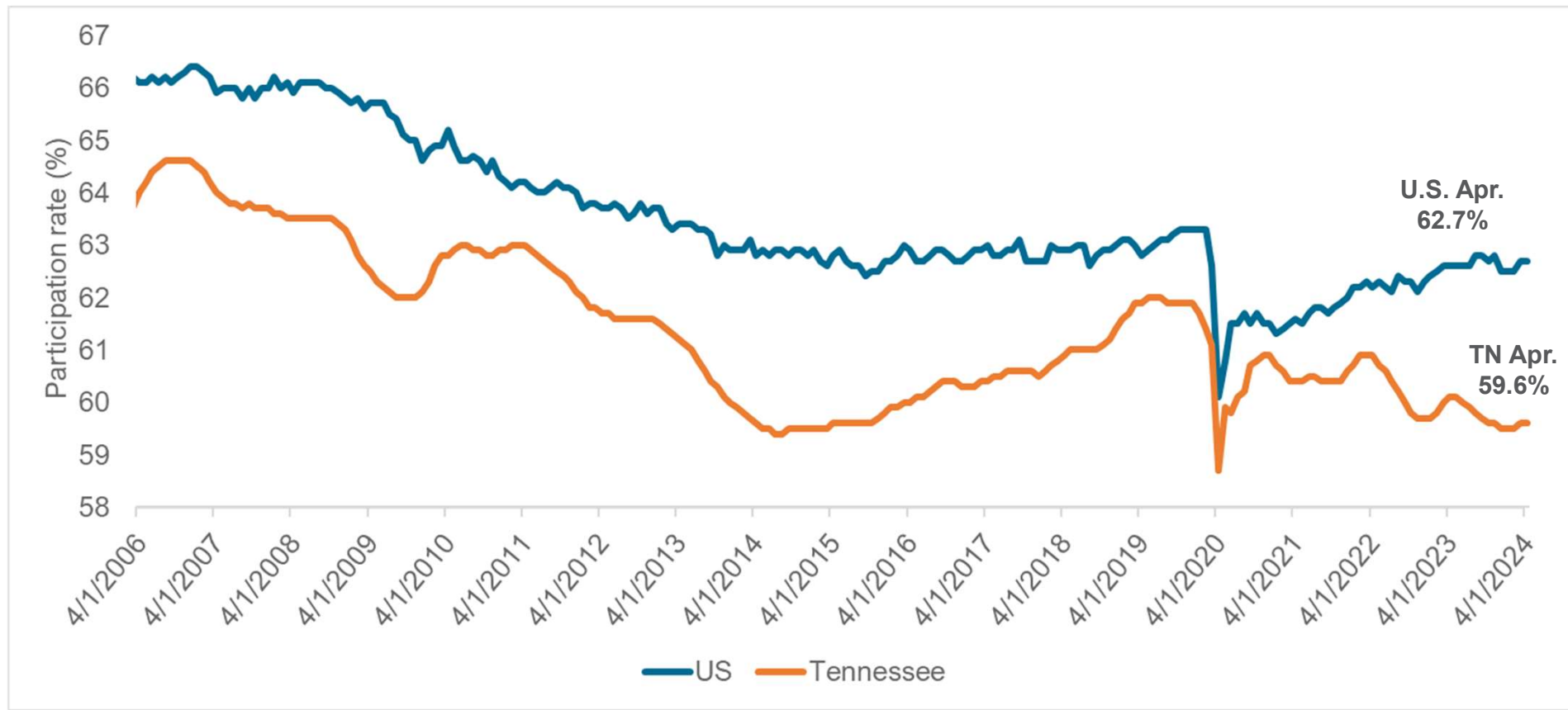
Source: Bureau of Labor Statistics

Tennessee Does Not Have Enough Workers to Fill All of the Current Job Openings



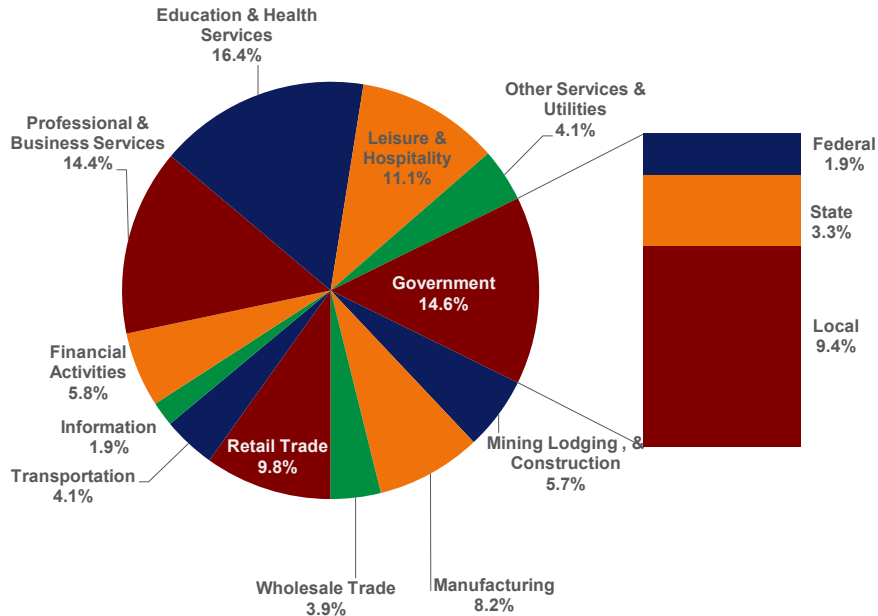
Source: Bureau of Labor Statistics Job Openings and Labor Turnover Survey

TN and the U.S. Labor Force Participation Rates Continue Their Long-Term Decline with an Aging Population

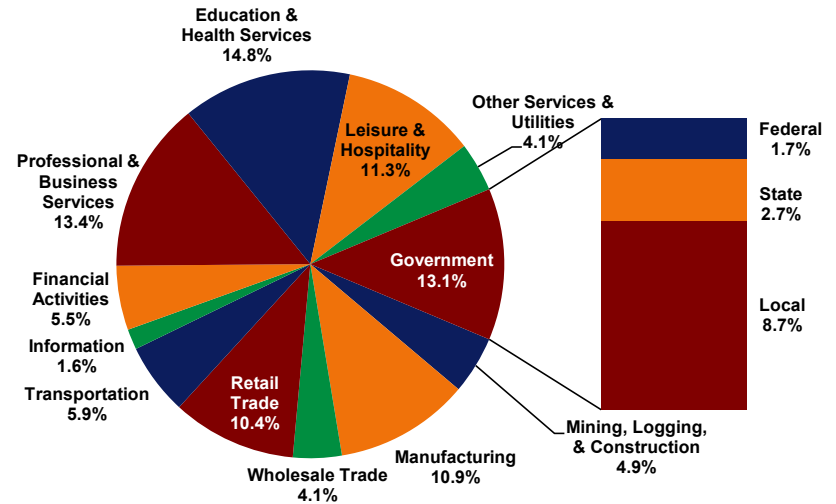


Tennessee has More Transportation and Manufacturing Jobs, Less Education and Health Jobs

United States

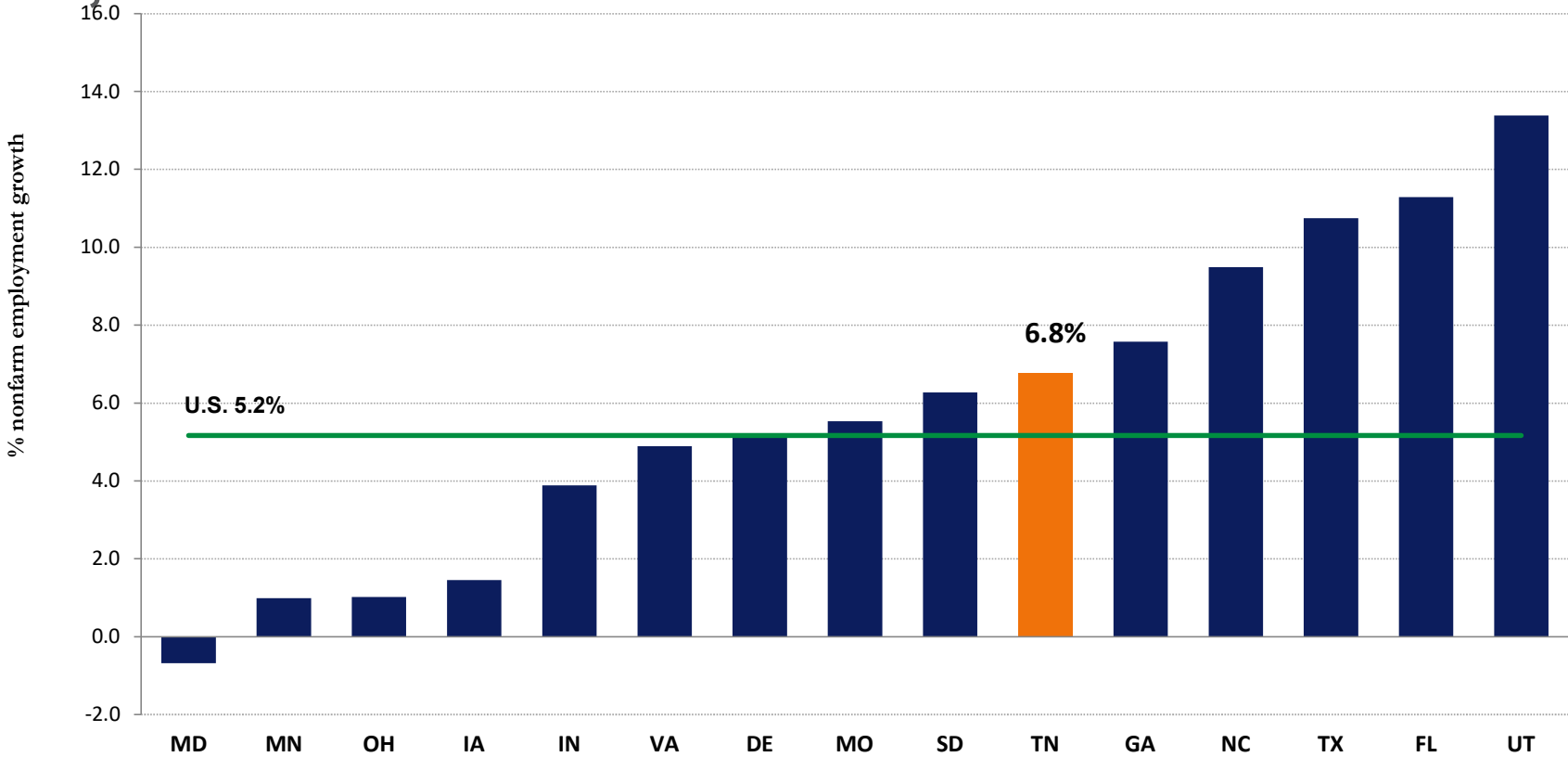


Tennessee

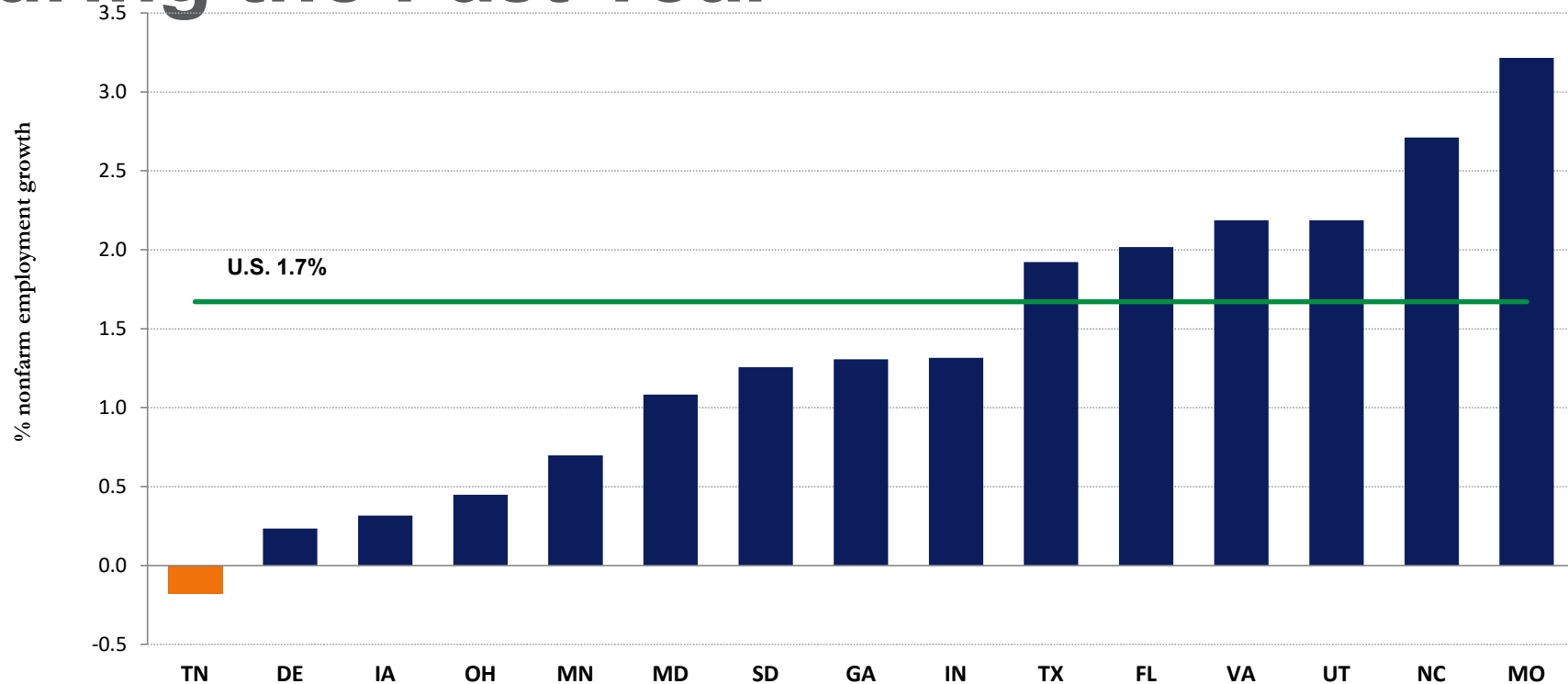


Notes: Carruthers (2023) using the 2021 American Community Survey, limited to 18-64 year-olds working full-time in the previous year.

Tennessee Employment Growth Exceeds Many Highly Rated States, Past 5 Years

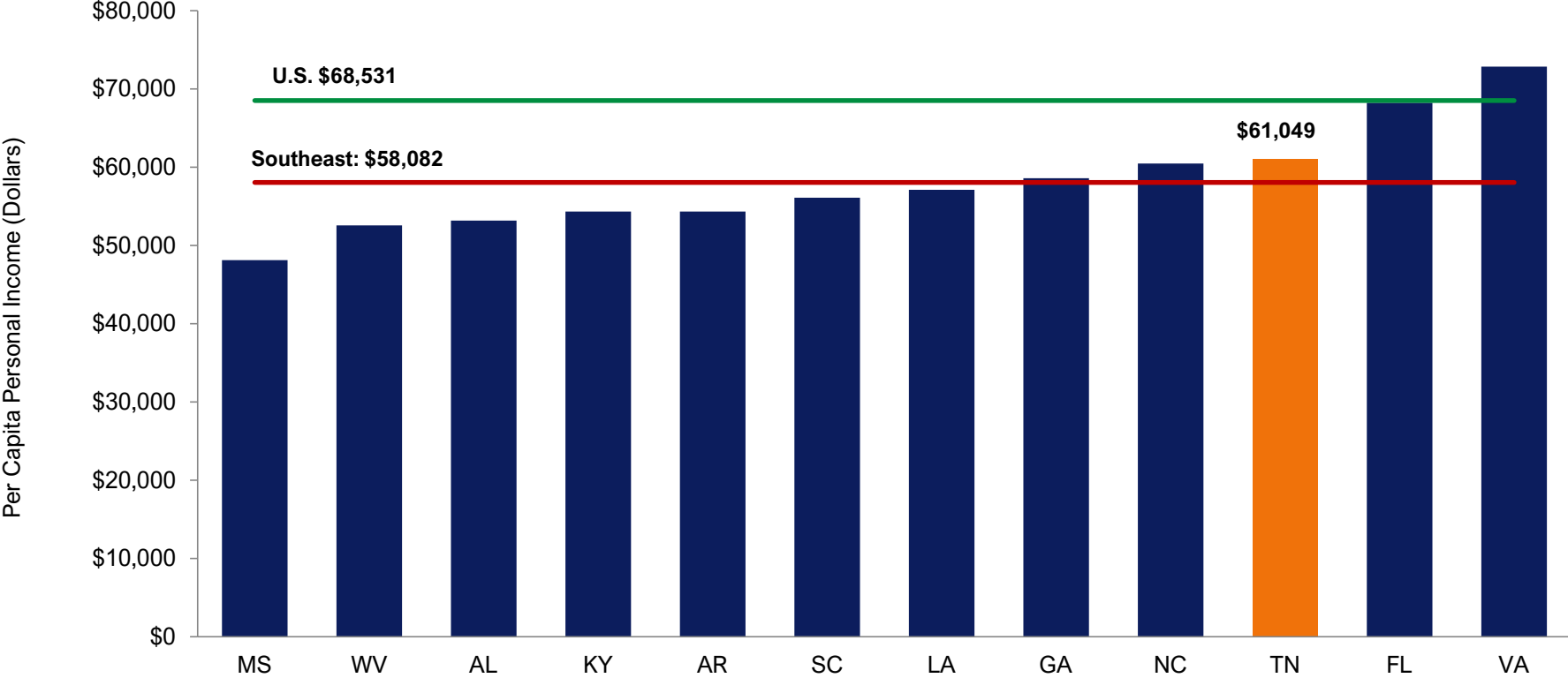


TN Employment Growth has Lagged During the Past Year



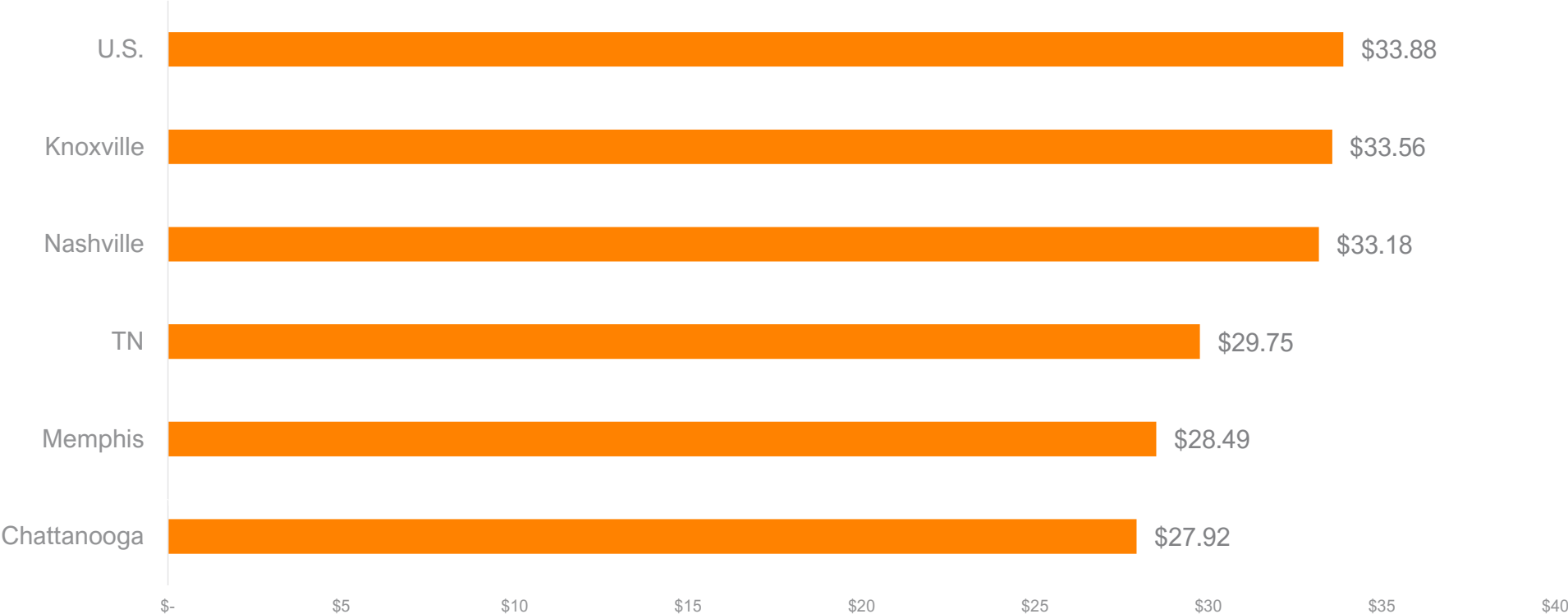
Source: BEA

Tennessee Per Capita Personal Income Among Highest in the Southeast, 35th in the Nation, 2023



Source: Bureau of Labor Statistics

Wages Across Tennessee Remain Below the National Average



Source: Bureau of Labor Statistics

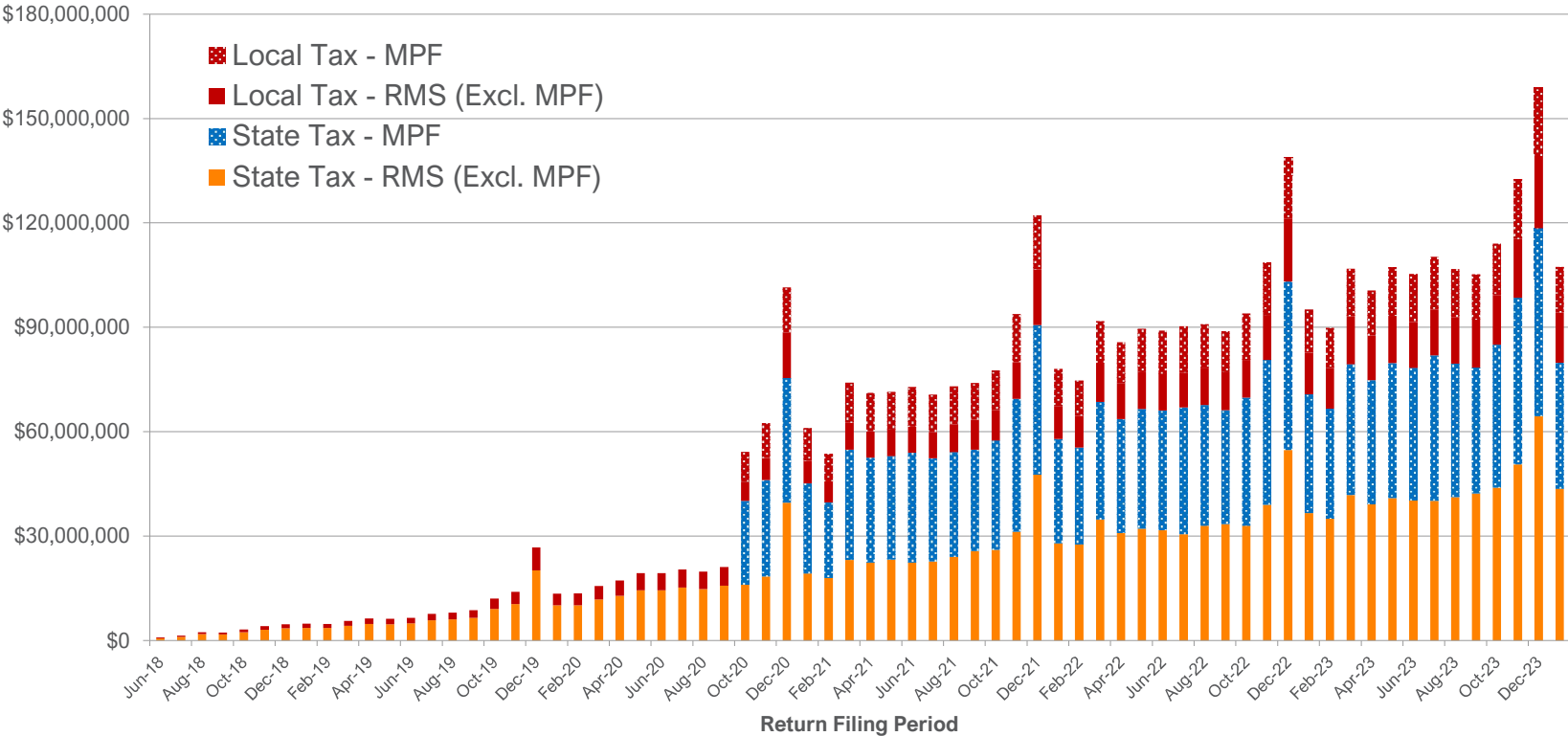
Tax Revenue Growth Rate Has Returned to more Normal Patterns – Last Year was Negative Net of Inflation



Source: TN Department of Revenue

Tennessee Tax on New Remote Sellers has Risen Dramatically Since the Wayfair Case

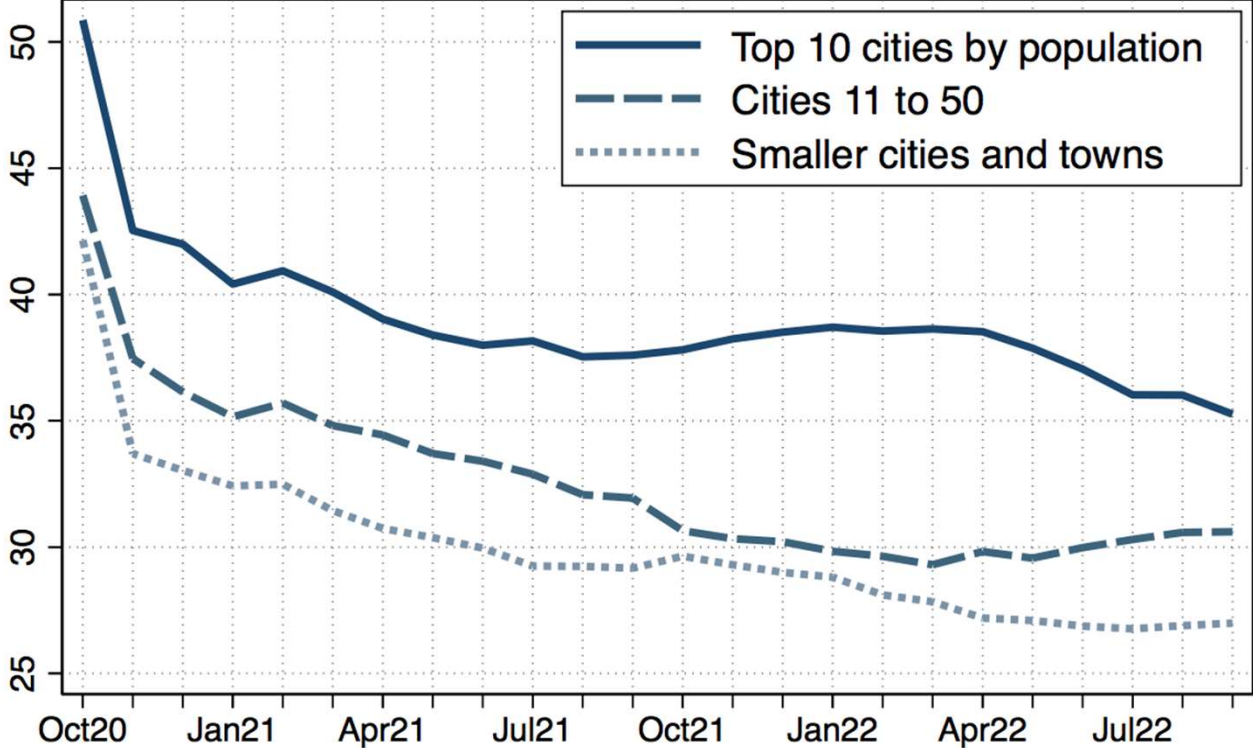
State and Local Sales Tax Due by Remote Sellers



Some Tax Issues for the Changing Economy

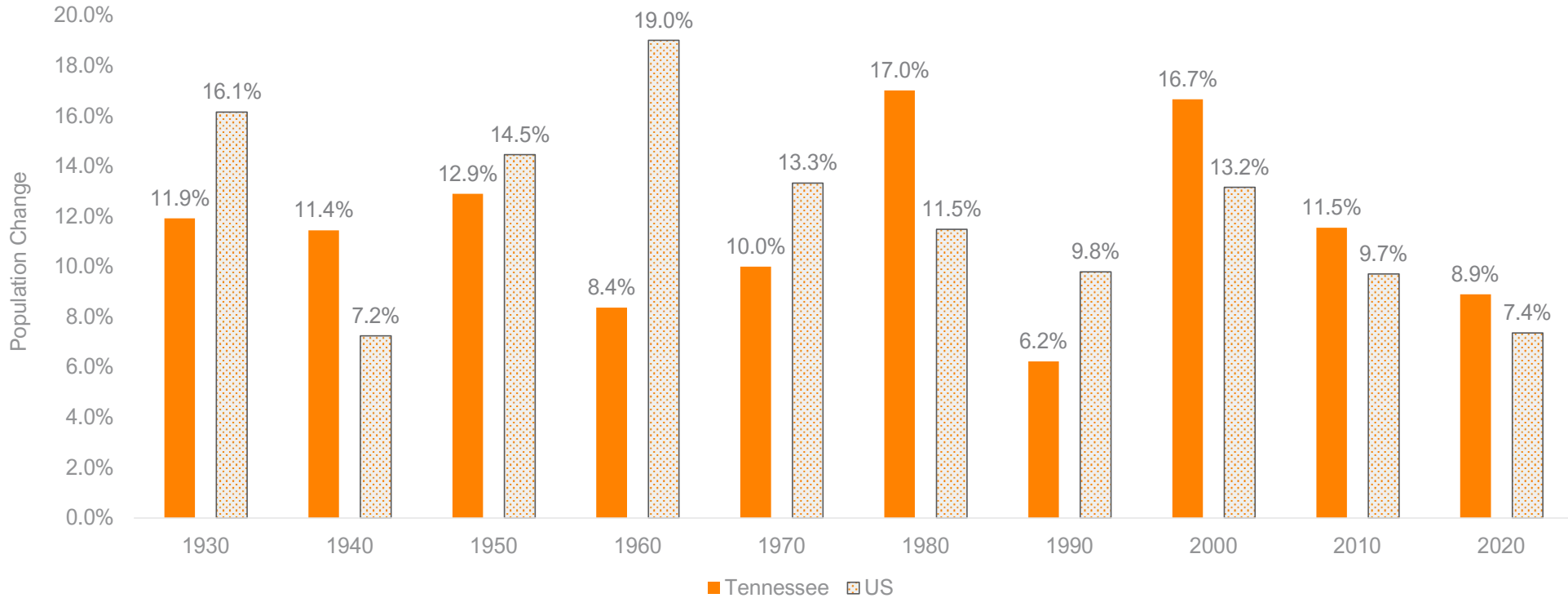
- Cross Border Shopping
- Digital Transactions
- Social Media and Items Not Monetized to Consumers
- Electric, More Fuel Efficient and Autonomous Vehicles
- Property Taxes and Remote Work

Percent of Paid Full Days Worked from Home

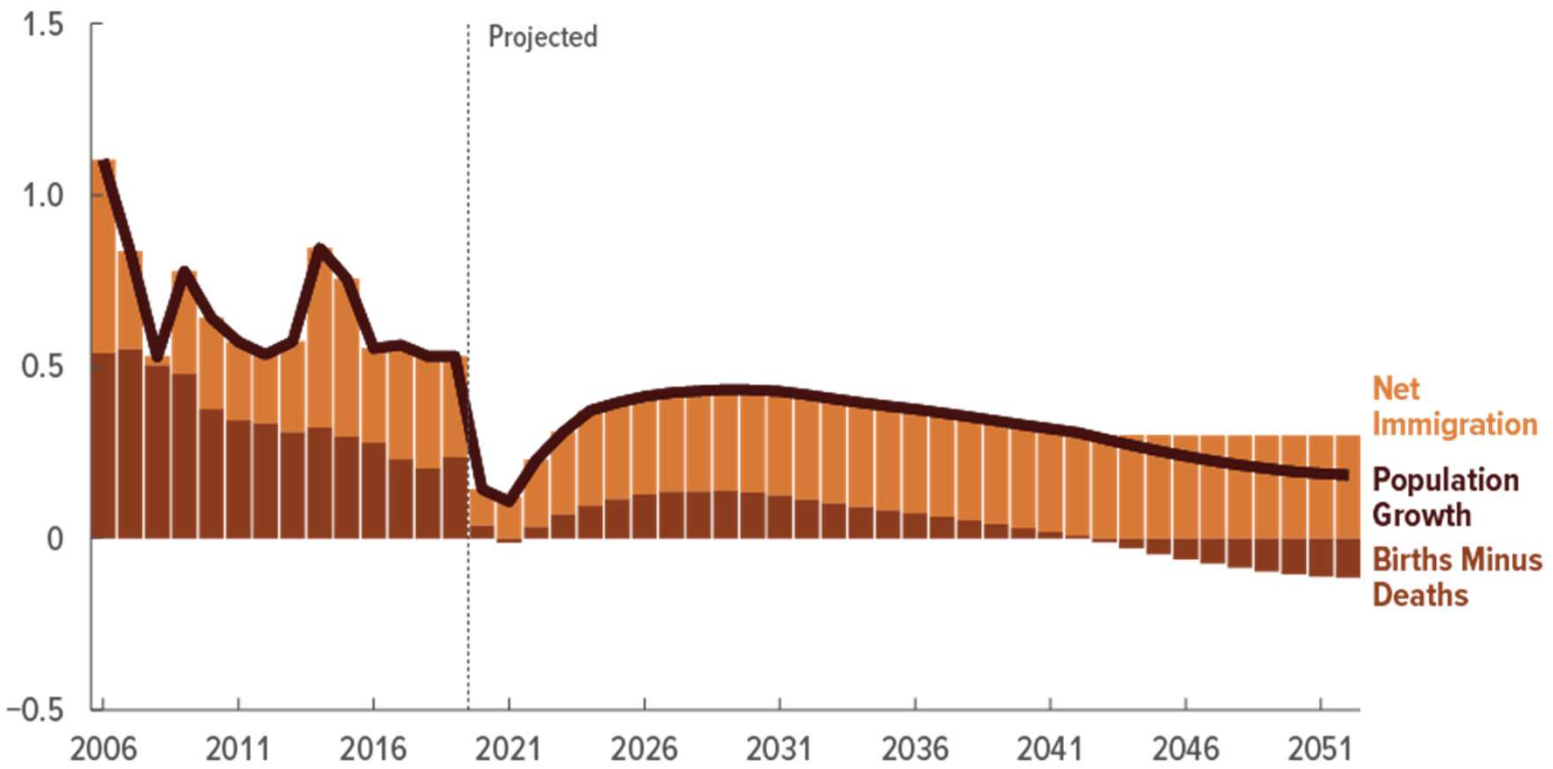


*We define cities using Combined Statistical Areas and use the location of the respondent's current job.

Over the Last Two Decades, Population Growth has Slowed Radically for TN and the Nation. Lowest Growth since the 1940s

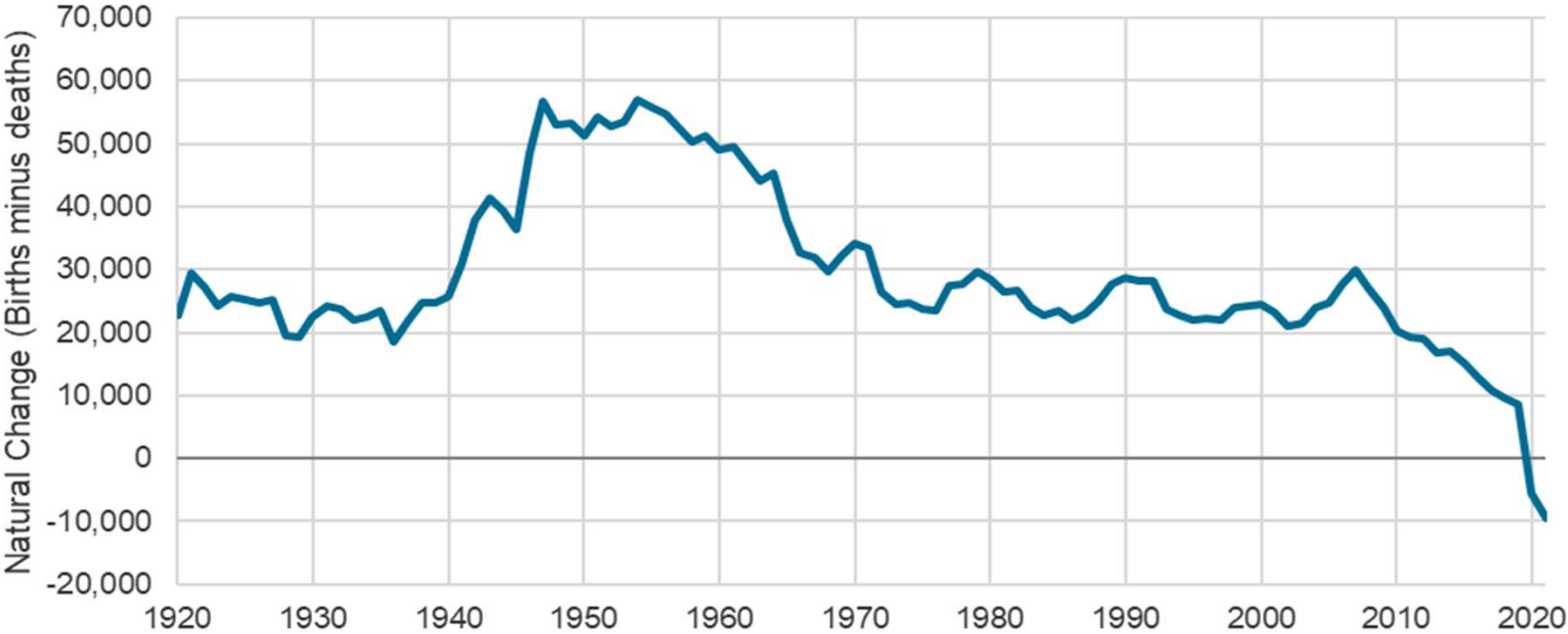


Natural Population Change will provide few New People in next 30 Years, Meaning Immigration likely will be the Source of Most Population Growth



Source: CBO

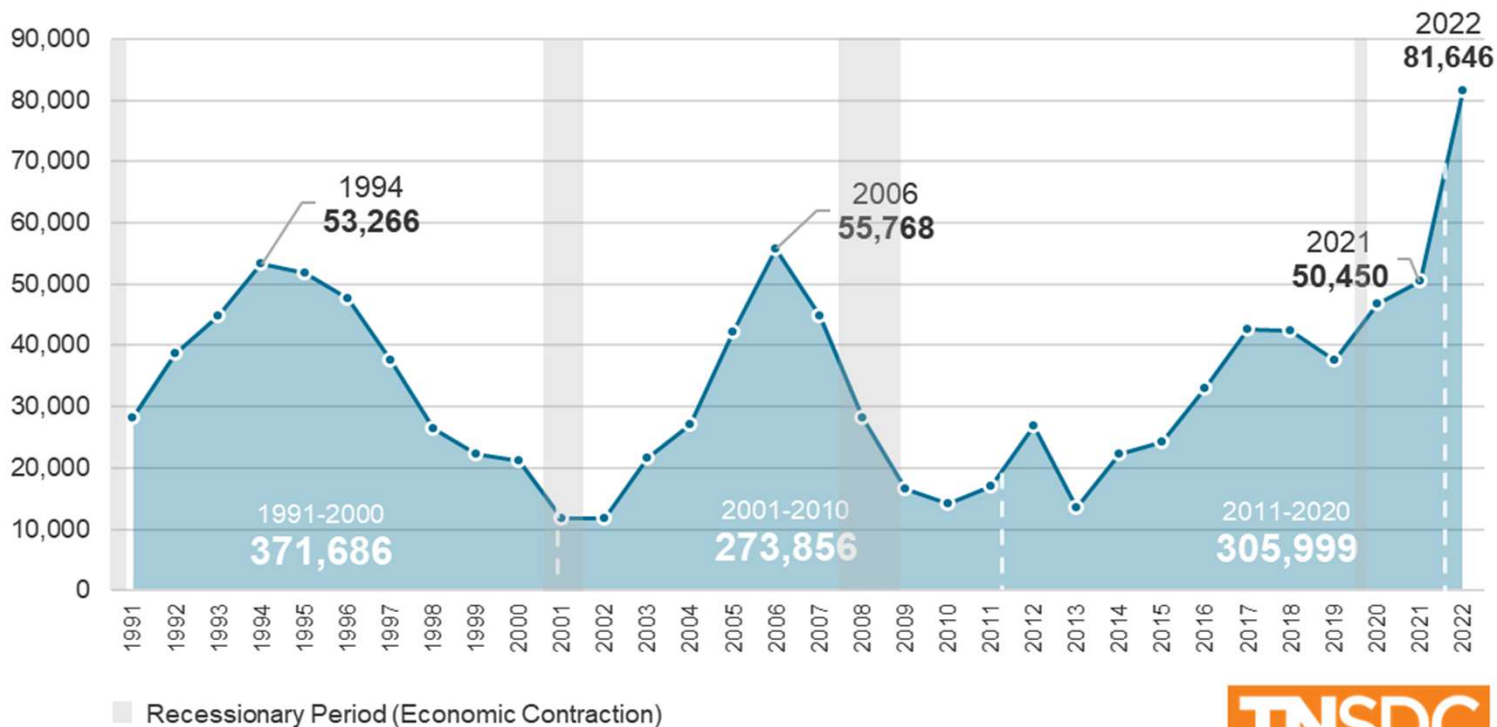
TN Natural Population Growth was Negative Last Year



Source: Tennessee Department of Health, Vital Statistics Bulletins



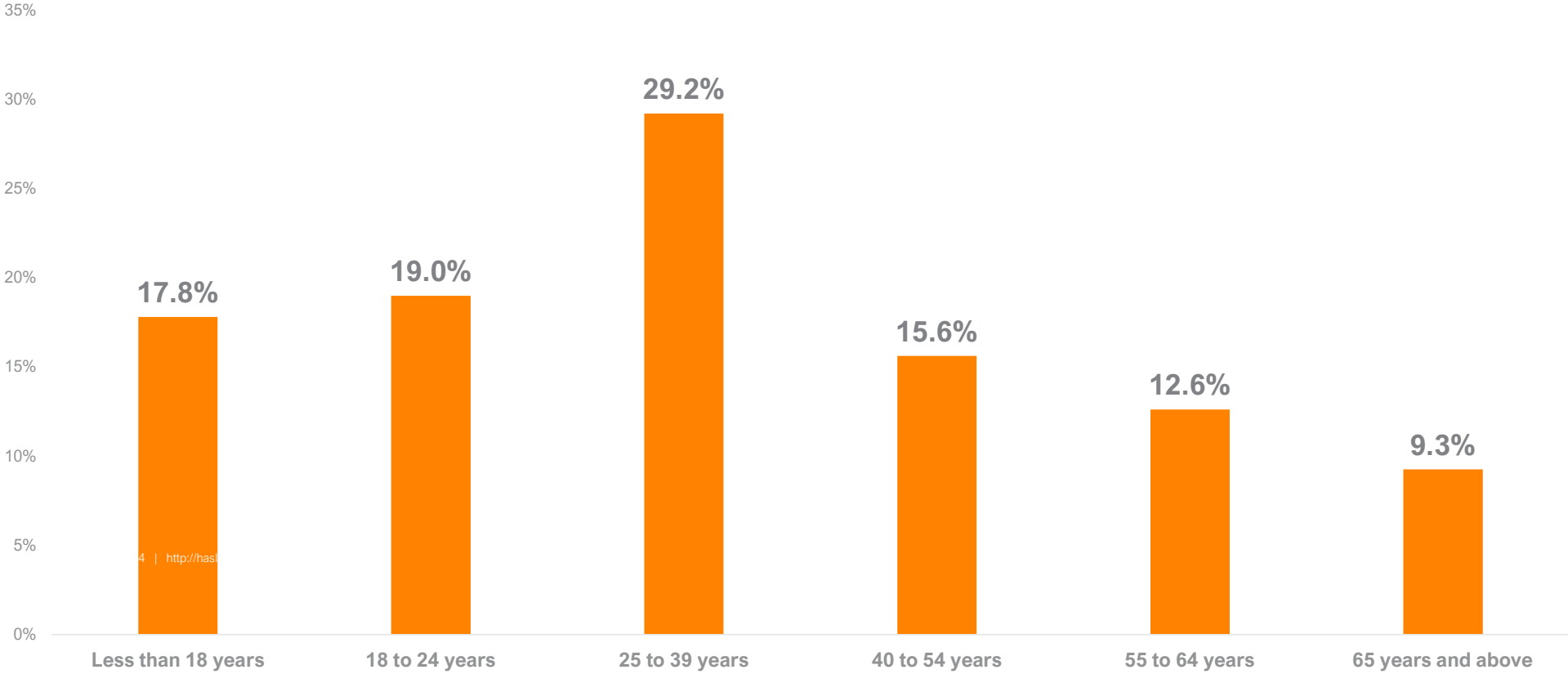
Net Migration Has Risen in Tennessee and is Essential to Finding Needed Workers



Source: U.S. Census Bureau, National Bureau of Economic Research



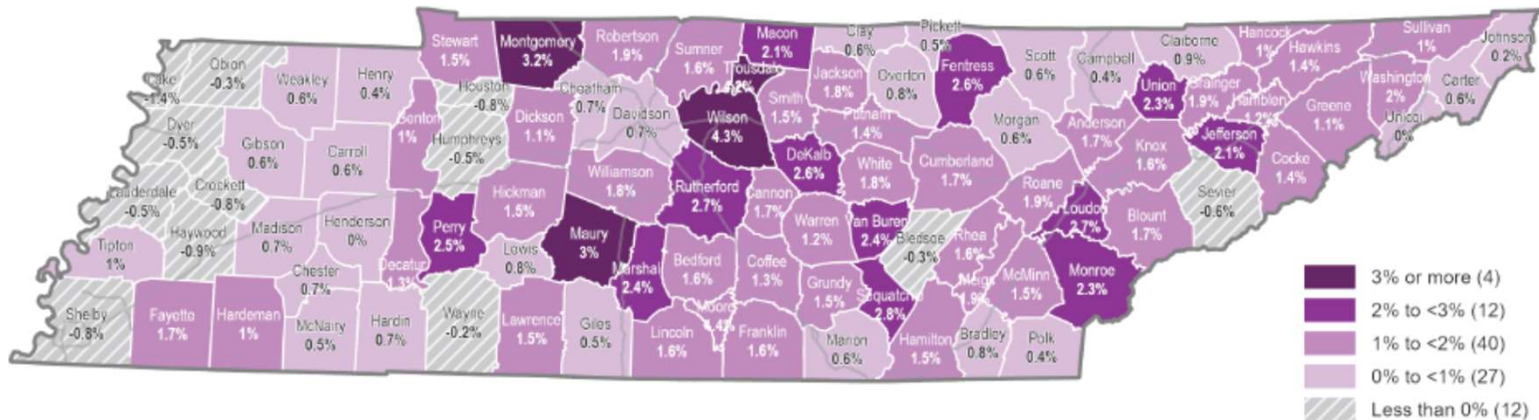
Most Migrants are of Working Age



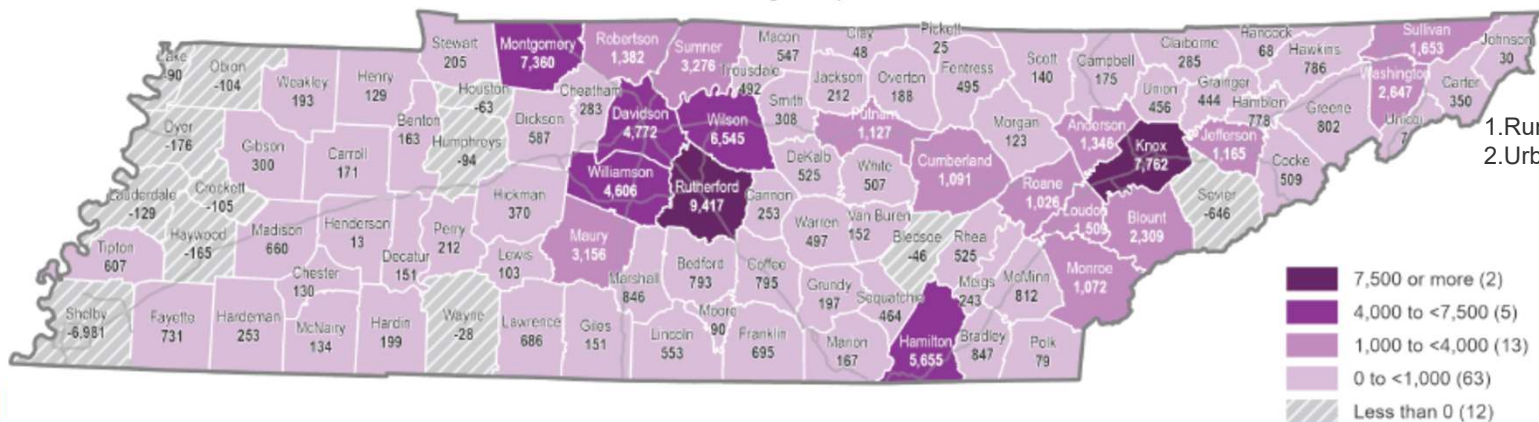
Source: U.S. Census Bureau

Most Population Increases in Metro Areas, but Many Others are Experiencing Good Growth Rates, 2021 to 2022

Panel A: Percentage Change



Panel B: Change in Population



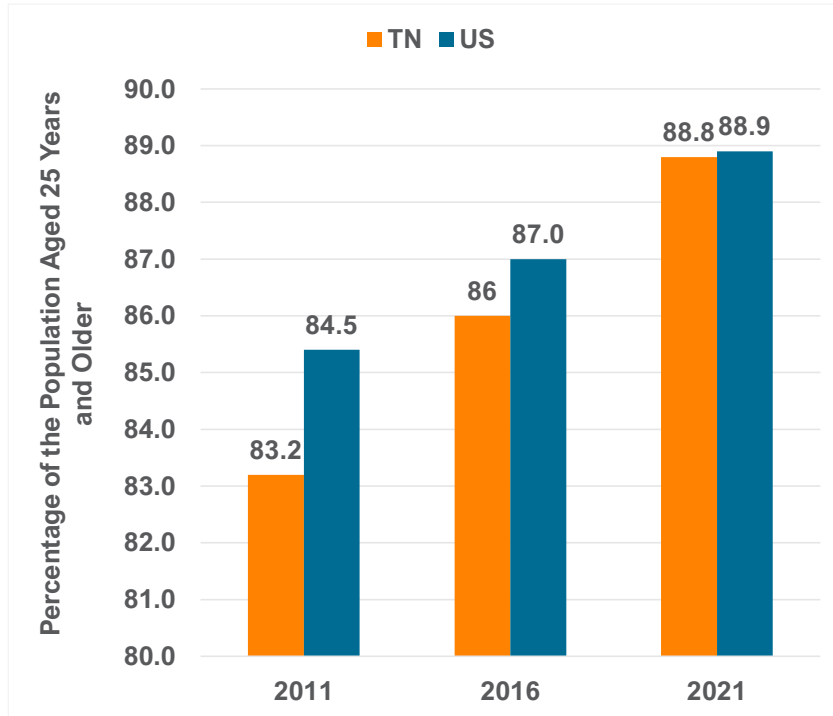
1. Rural: +35,022 (+1.4%) in 2022
2. Urban: +47,966 (+1.1%) in 2022

Some Implications of Slow Population Growth

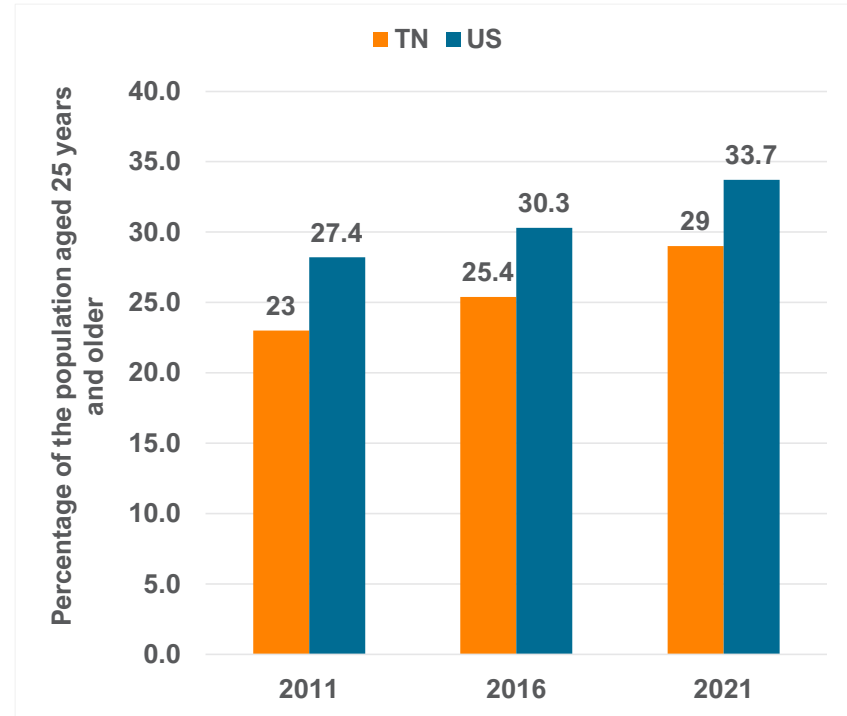
- Difficulty in funding Social Security and Medicare
- Slower labor force growth and therefore slower economic growth
- Inability to Meet Employer Needs
- Changing demands for local services
 - Less demand for k-12 education and perhaps lower demand for post-HS education
 - More demand for parks,...

Tennessee Has Lower Post-HS Educational Attainment than the US Average

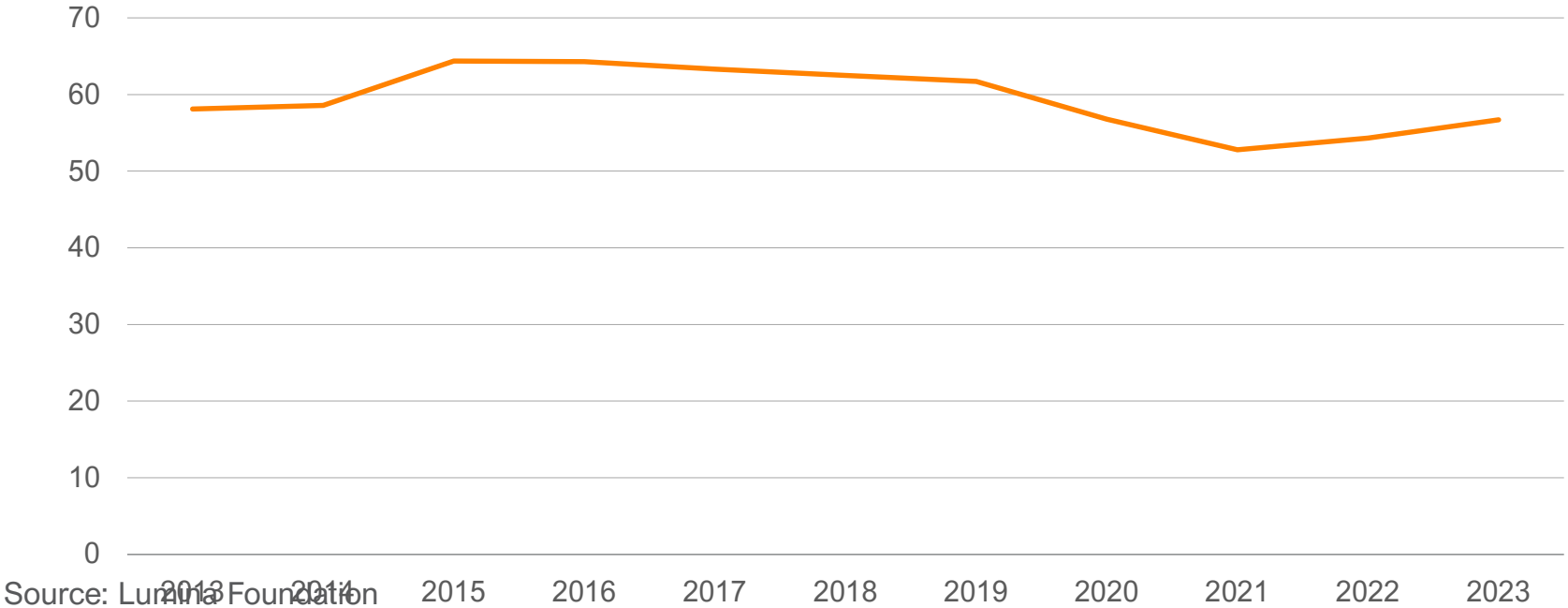
High School Graduates or Higher



Bachelor's Degree or Higher

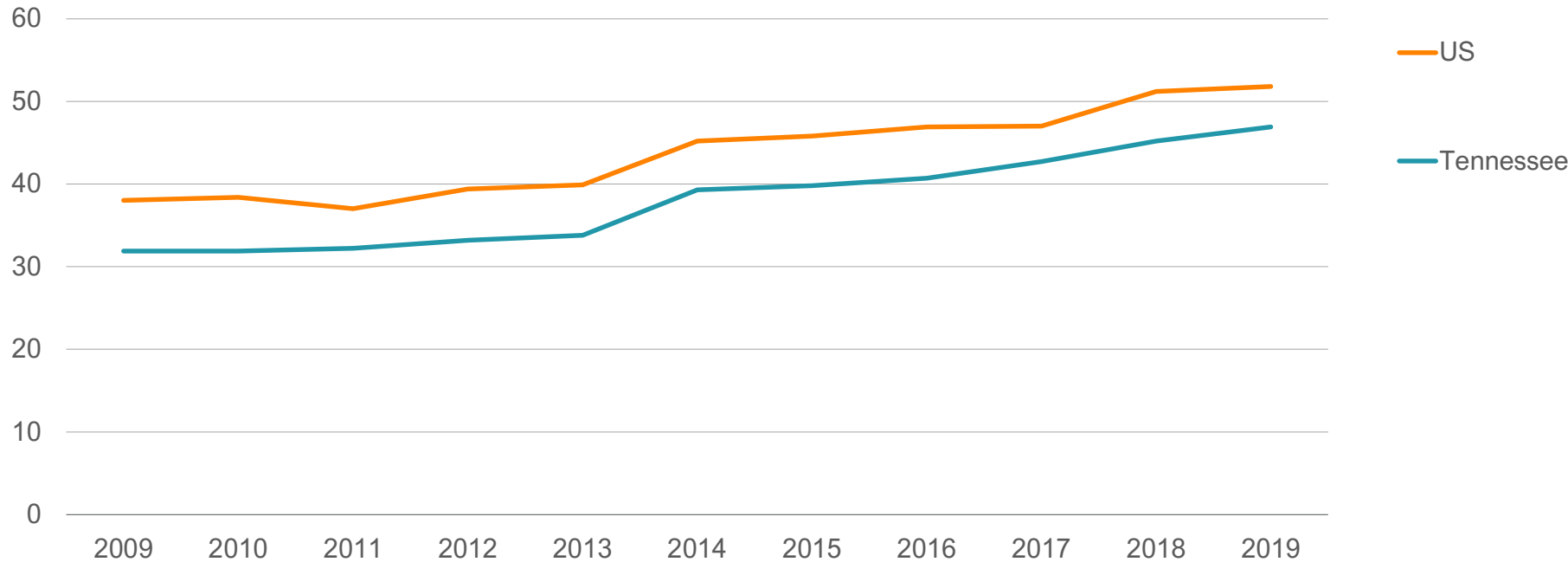


Tennessee Promise Significantly Increased College Going Rate, but the Gains were Lost During Covid, Percent



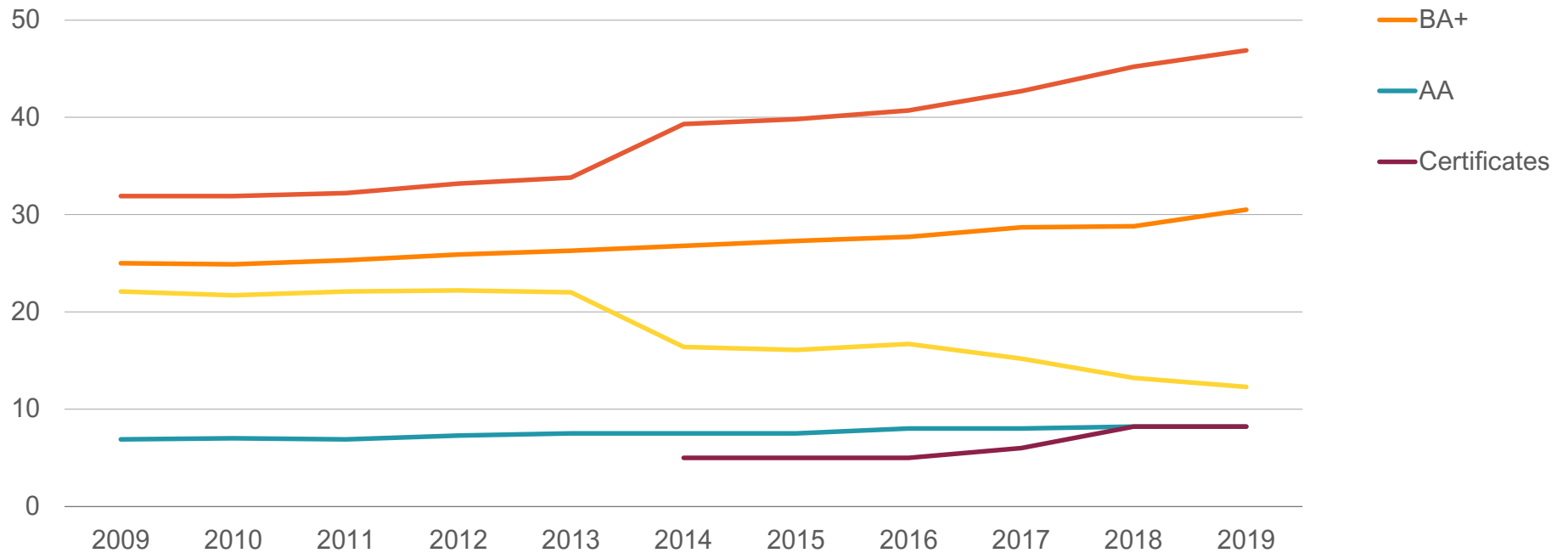
Source: Lumina Foundation

Pre-Covid TN Saw Very Strong Increases in Post High School Attainment, But Remained well Under US and the Drive to 55 Target



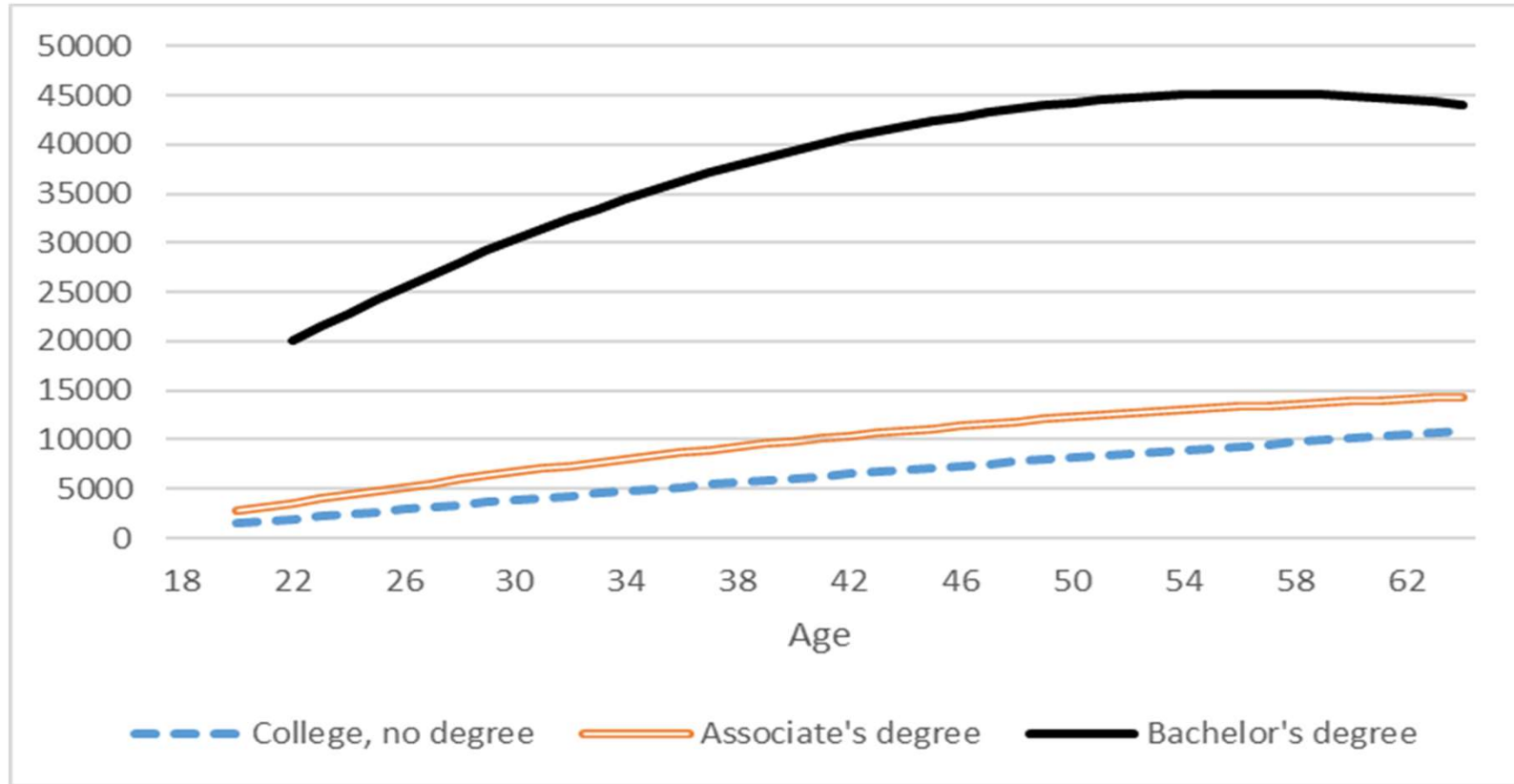
Source: Lumina Foundation

TN Improved in all Areas of Post HS Attainment, except some college



Source: Lumina Foundation

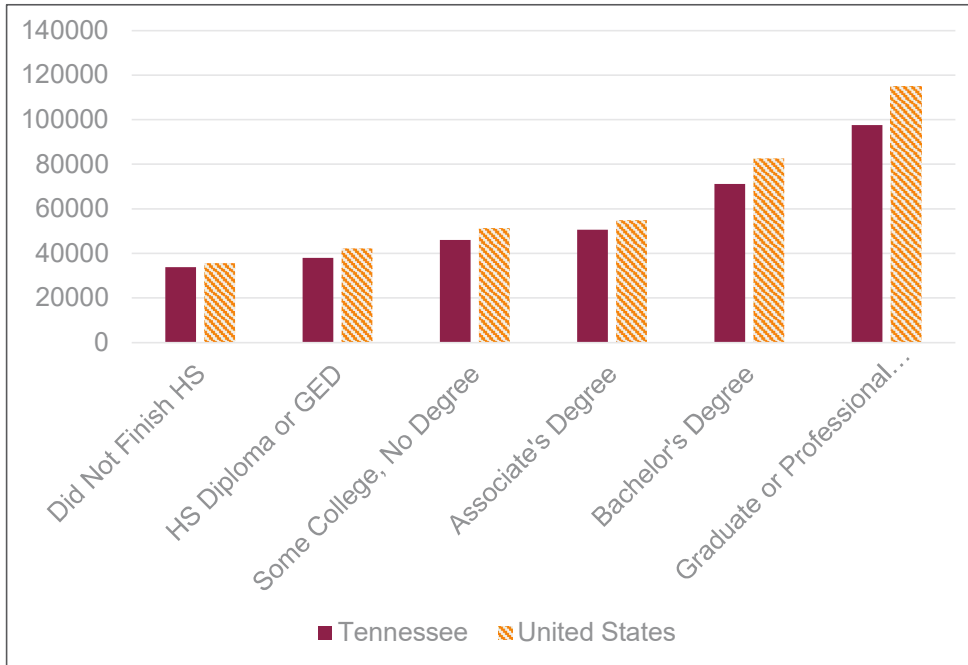
The additional earnings for college educated workers, relative to high school-educated workers, widen over workers' careers



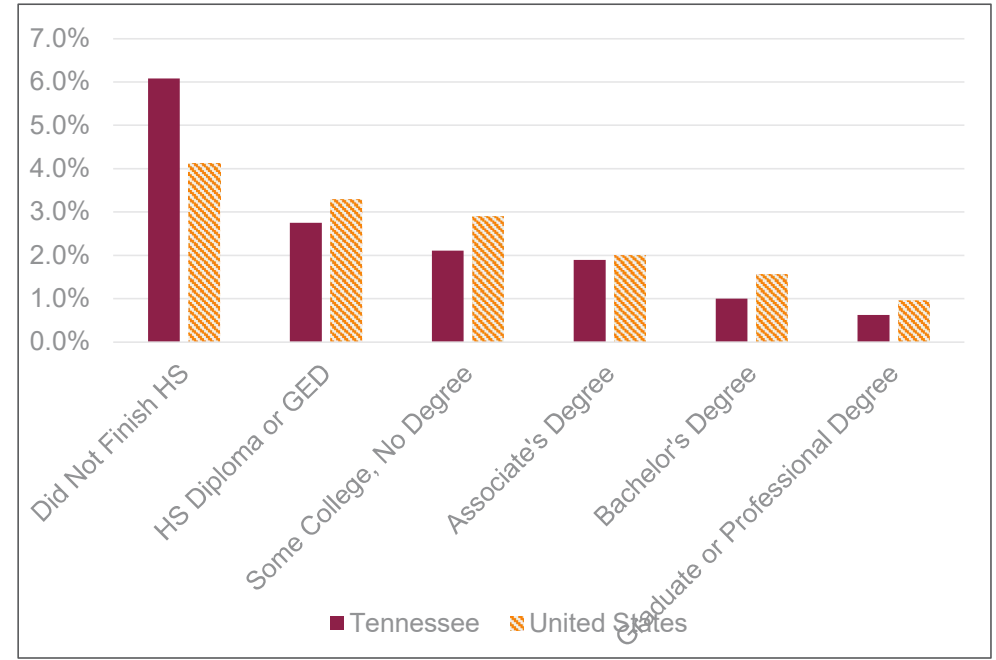
Source: Carruthers, 2023

Better Educated People have Higher Earnings and Lower Unemployment

Annual Salary and Wages (2021\$)

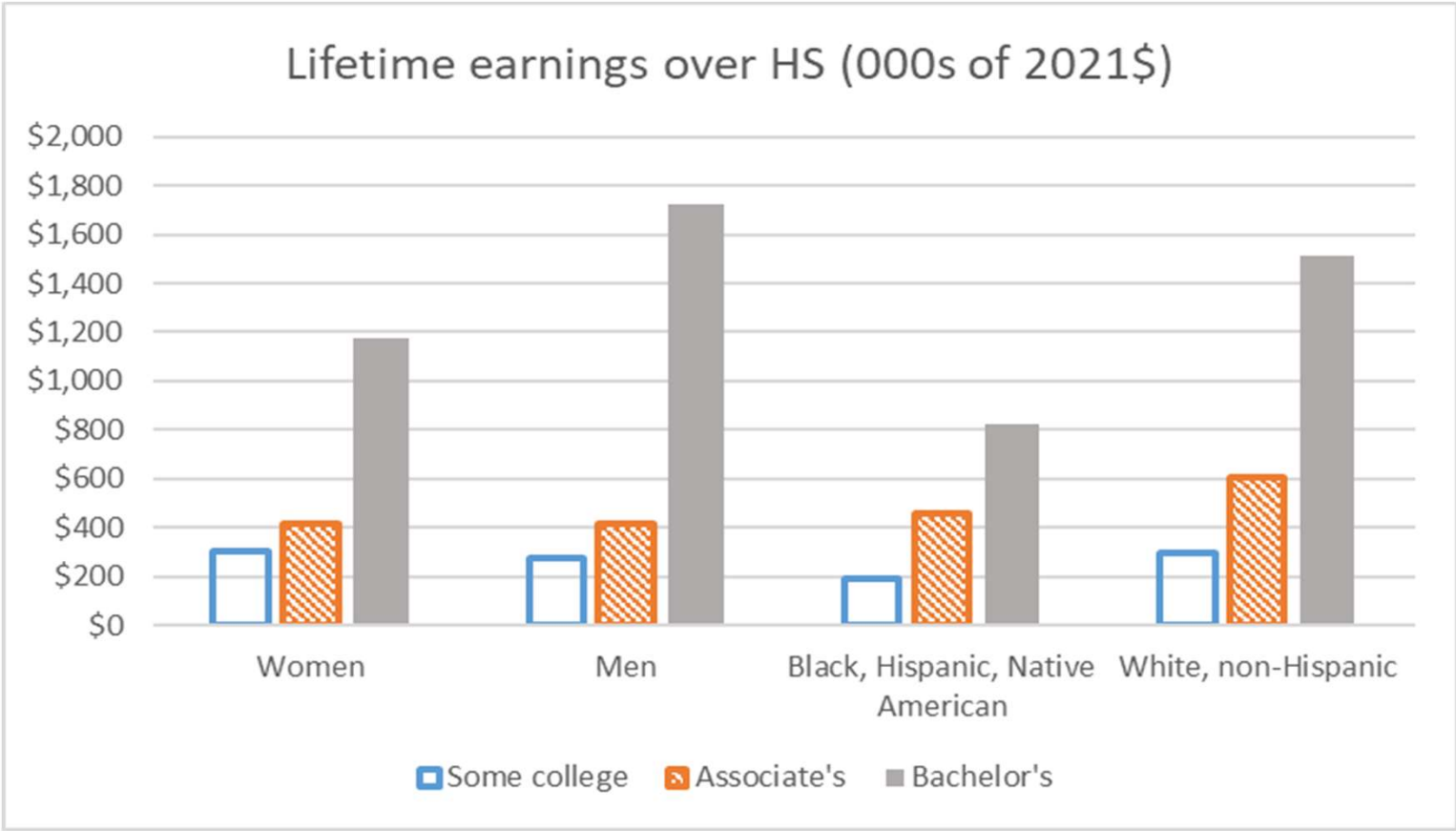


Unemployment Rate (%)



Notes: Carruthers (2023) using the 2021 American Community Survey, limited to 18-64 year-olds working full-time in the previous year.

All Demographic Groups Benefit from More Education



Carruthers, 2023

