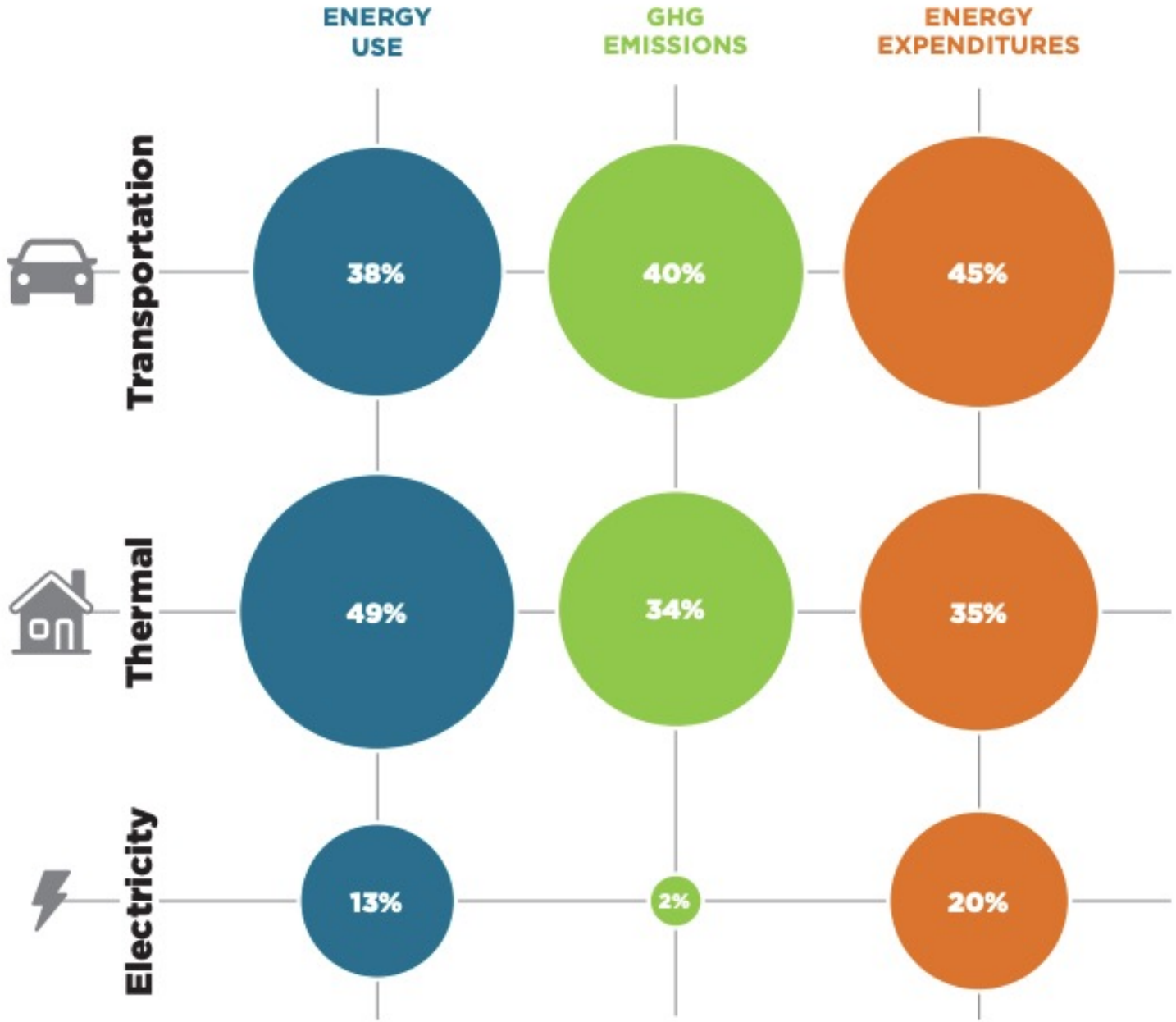
House Energy & Technology Committee Testimony

January 25, 2022

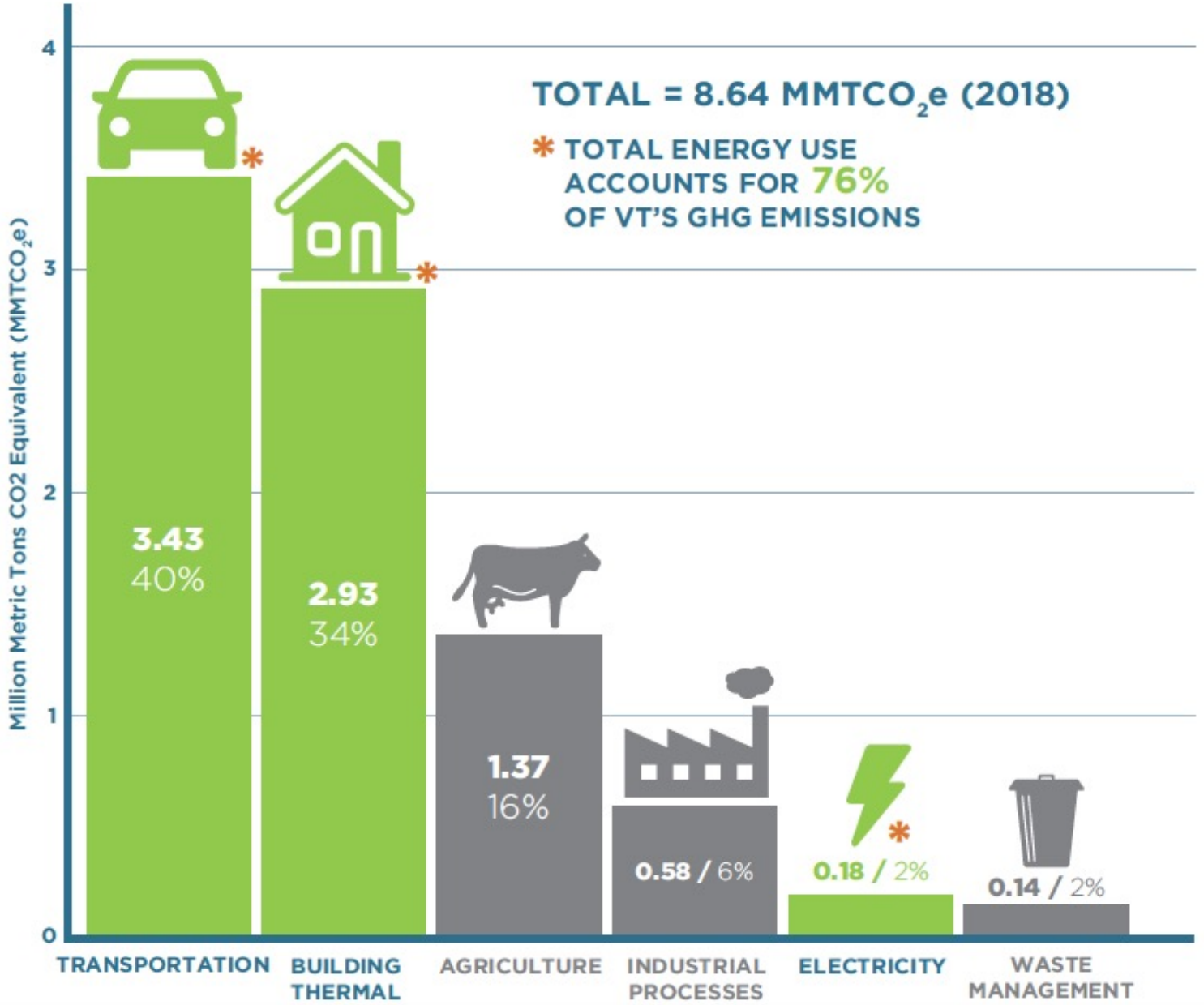
Key Takeaways

- Over 1/3 of Vermont's climate pollution comes from thermal fuel use, primarily from fossil fuels used for home and building heating
- Dependence on fossil fuels -- especially propane and fuel oil -- is expensive, with unpredictable price swings for VT consumers. This creates an especially large energy burden for lower-income Vermonters.
- 99% of VT homes were built prior to 2014. New building codes are of limited effectiveness because they don't improve existing homes or heating systems.
- Fossil fuels create a major drain on Vermont's economy, with most dollars spent on them leaving the state. In contrast, weatherization and renewable heating keeps much more money local, strengthening the VT economy and supporting good paying local jobs.



Source for Energy Use: Thermal and transportation based on EIA 2018 site energy; electricity from PSD site energy, after accounting for RECs.
Source for GHG Emissions: Vermont Agency of Natural Resources, Vermont Greenhouse Gas Emissions Inventory and Forecast (1990-2017), 2021.
Source for Energy Expenditures: VEIC, Vermont Energy Burden Report, 2019.

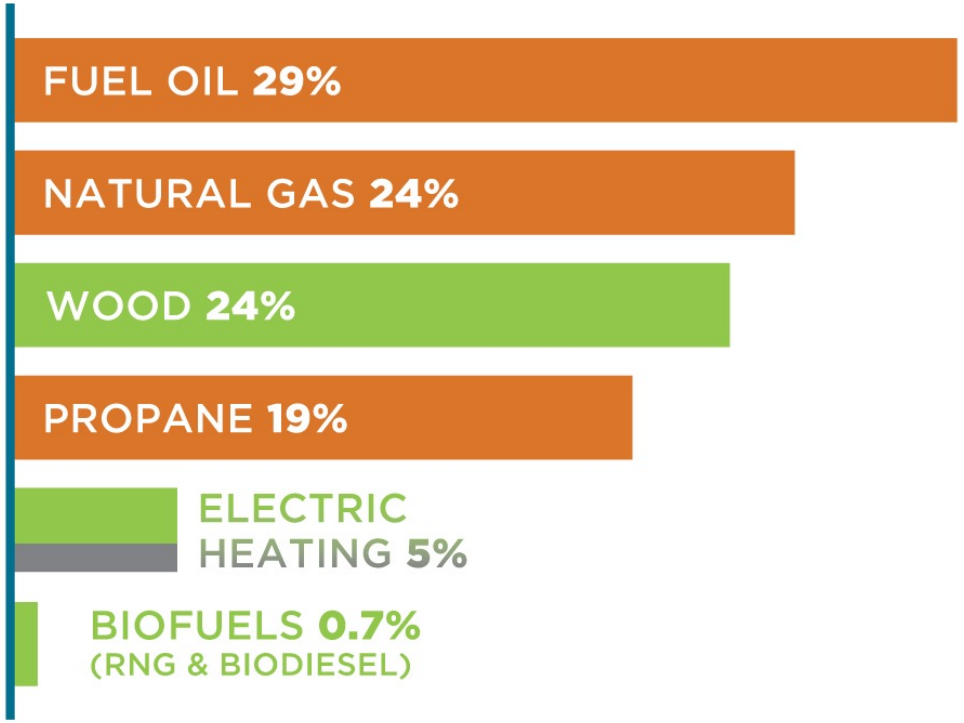
Vermont's GHG emissions by sector, 2018



Source: Vermont Agency of Natural Resources, Vermont Greenhouse Gas Emissions Inventory and Forecast (1990-2017), 2021.

Nearly ¾ of VT Heating is Fossil-Based

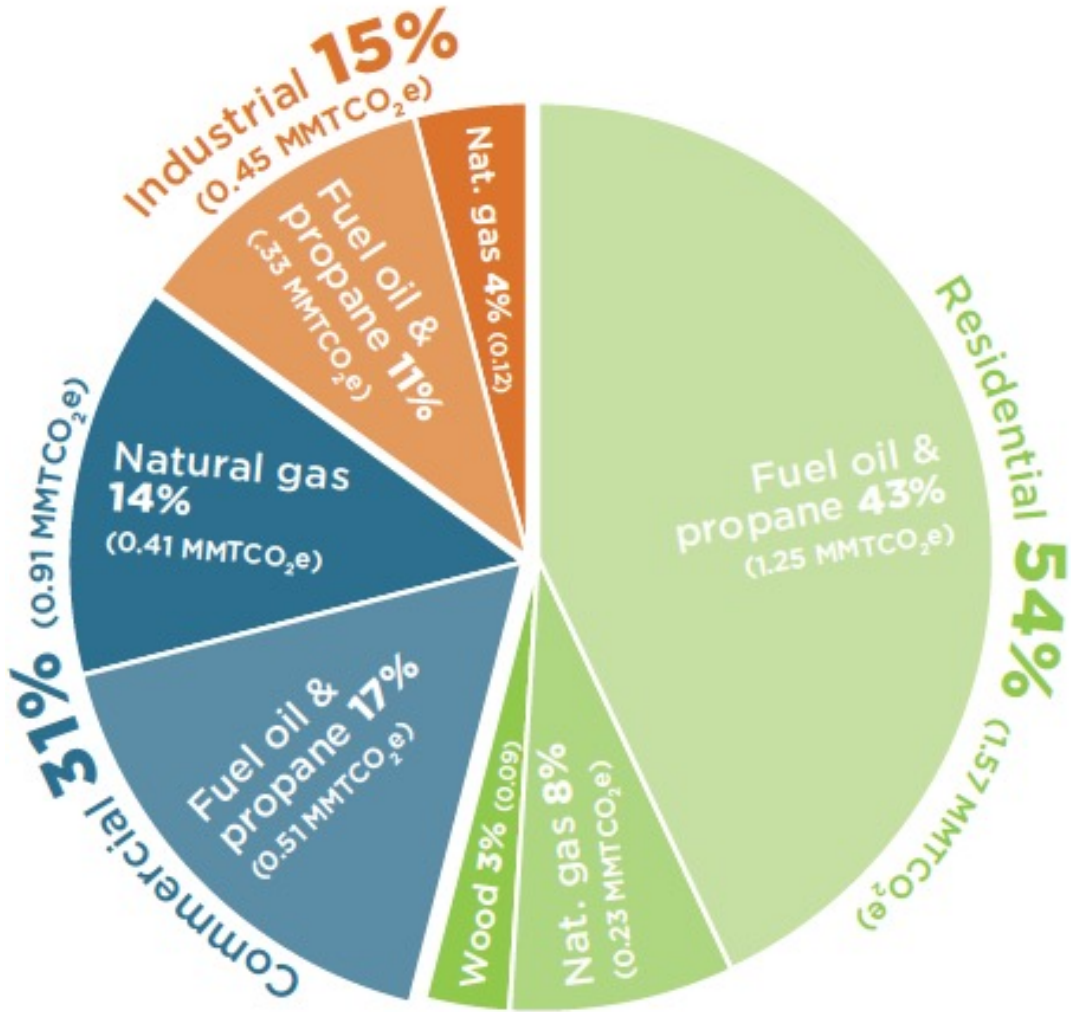
Vermont heating energy sources, 2018



Source: EIA, 2020; Vermont Department of Public Service, 2020; Efficiency Vermont, 2020; Vermont Agency of Natural Resources, 2020

ENERGY ACTION NETWORK

Vermont thermal GHG emissions by sector and fuel type

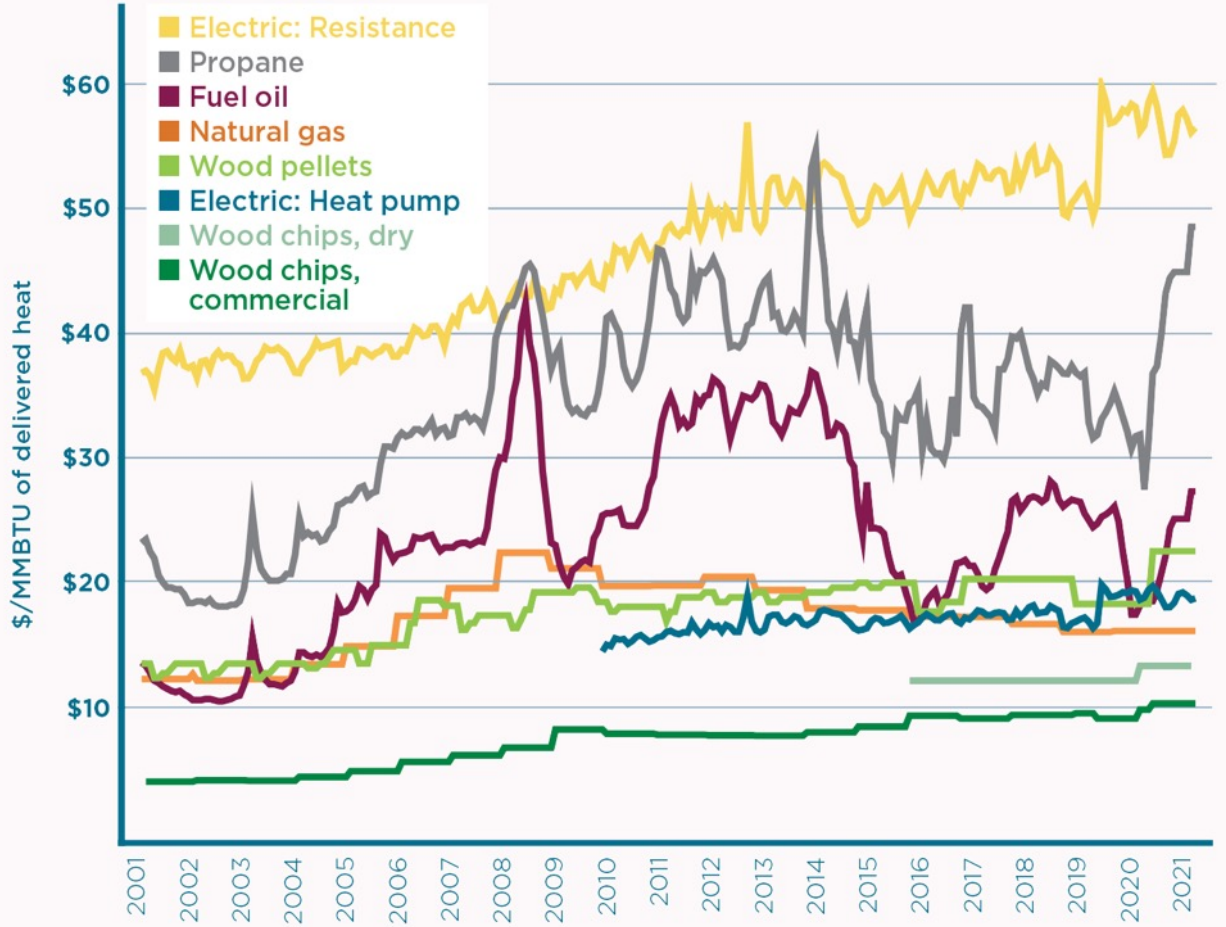


Source: Vermont Agency of Natural Resources, Vermont Greenhouse Gas Emissions Inventory Forecast (1990-2017), 2021.

VT Homes and Buildings are Old and Their Heating Systems Have Long Lifespans

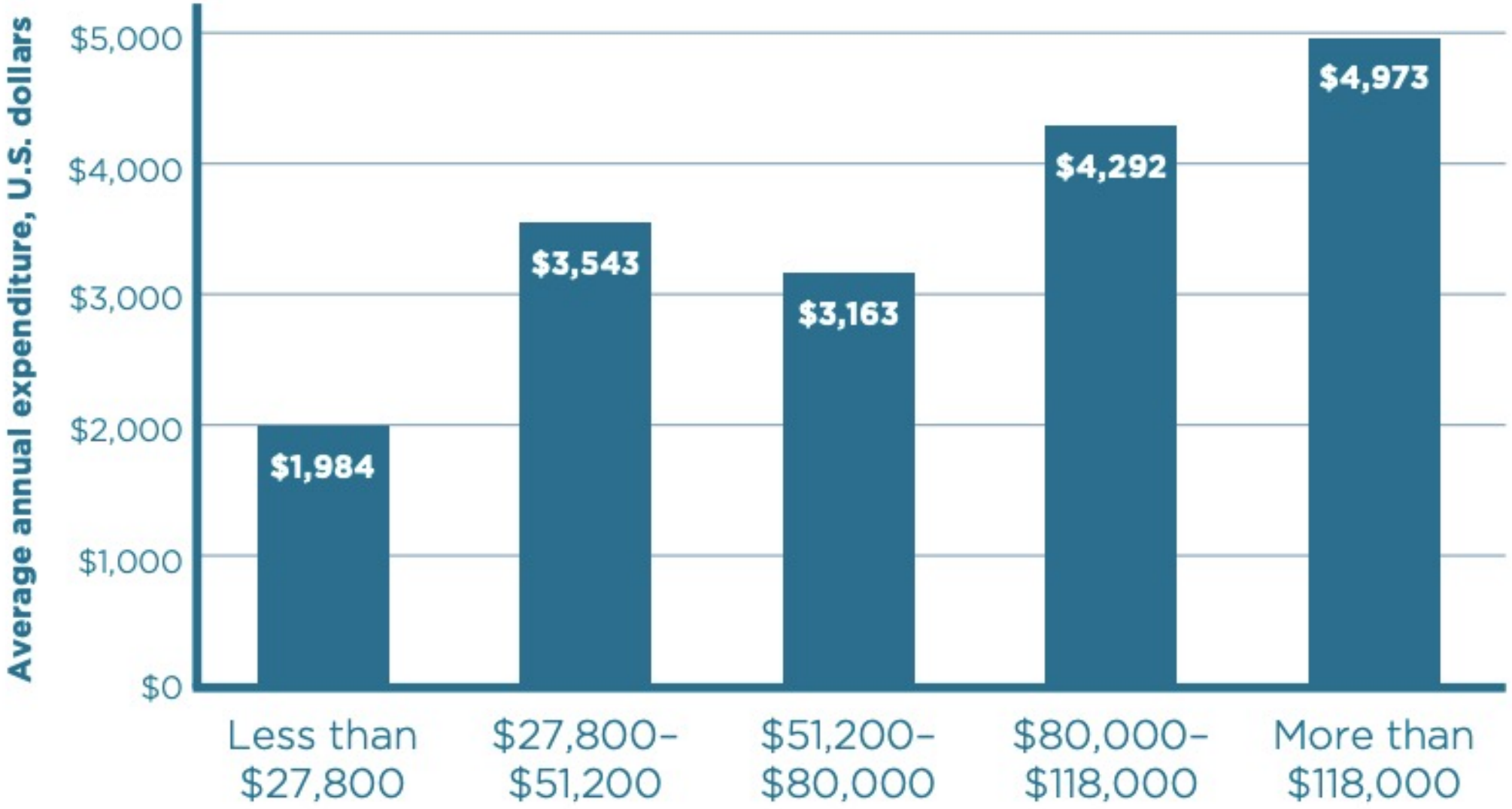
VT'ers Using Fuel Oil and Propane Pay High Costs and Are Exposed to Volatile Prices

Cost comparison of heating options over time



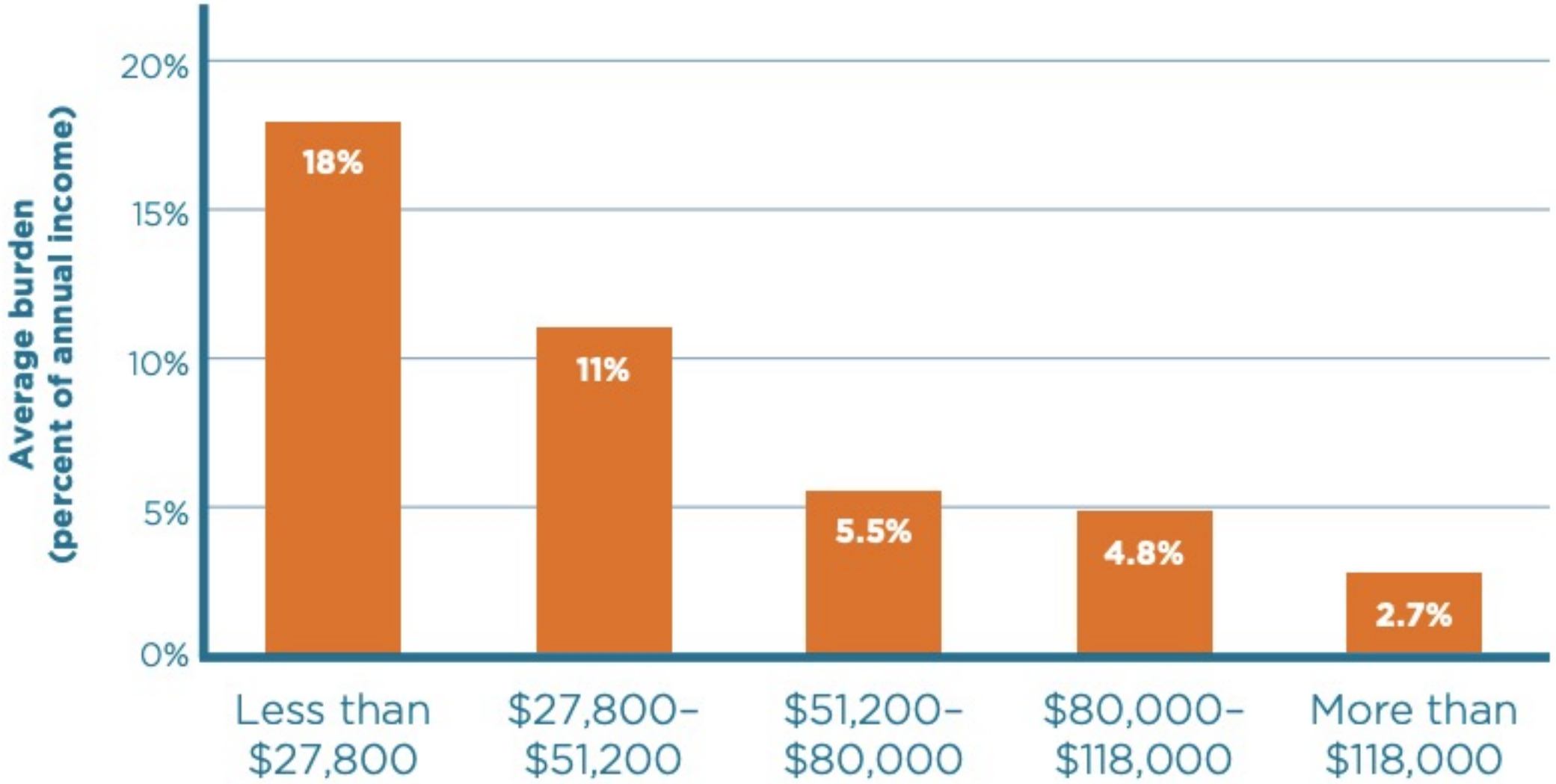
Source: Biomass Energy Resource Center, 2021. Note: electricity prices presented here are a statewide average. Electricity prices vary by utility territory.

Combined heating and electricity expenditures in Vermont, by income quintile



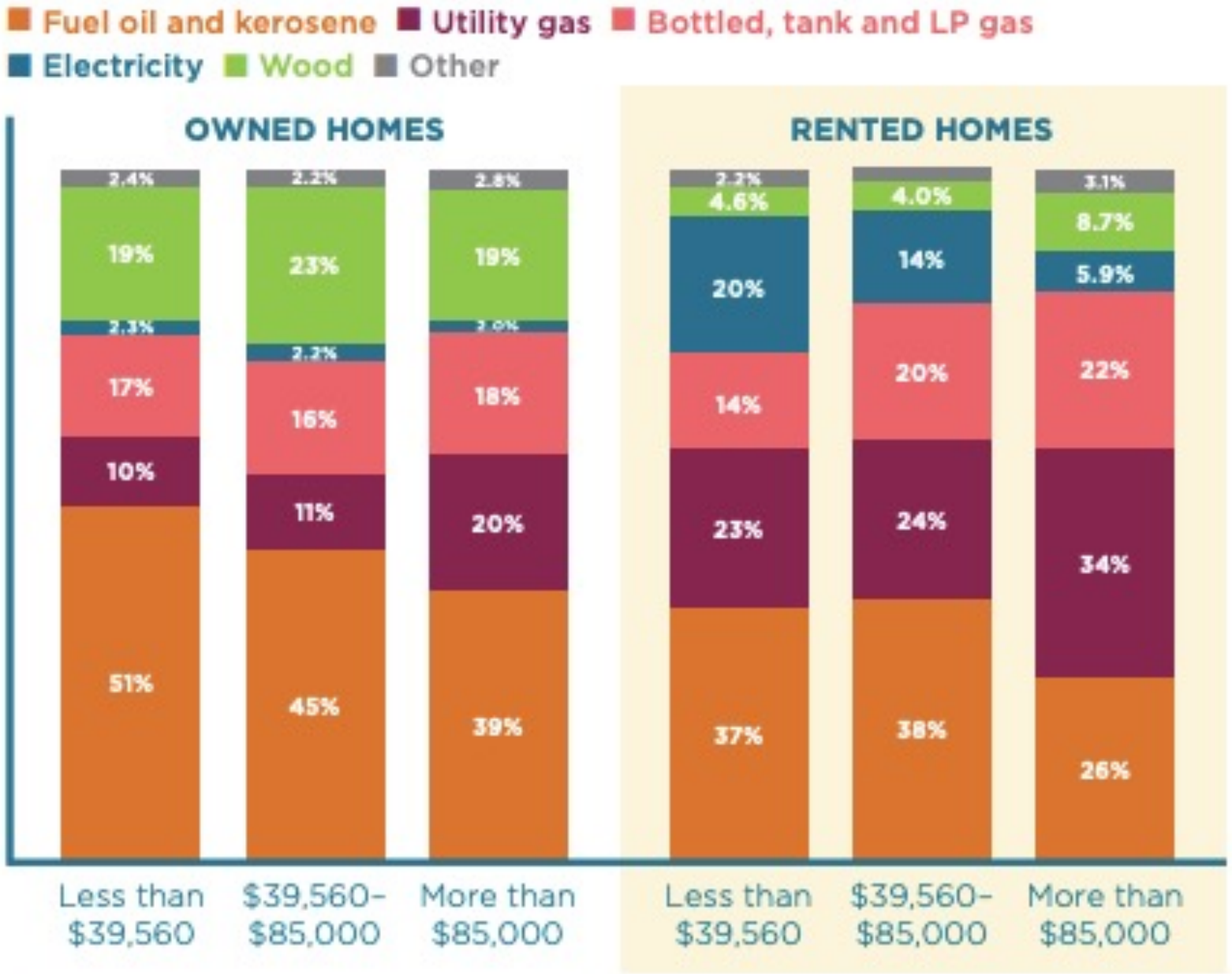
Source: U.S. Census Bureau, American Community Survey, 2018.

Combined heating and electricity energy burden in Vermont, by income quintile



Source: U.S. Census Bureau, American Community Survey, 2018.

Vermont household fuel use by housing type



Source: U.S. Census Bureau, American Community Survey, 2018.

Average annual fossil fuel spending in VT, 2009–2018

Source: Vermont Agency of Commerce and Community Development. 2021.