FILED
December 29, 2017
Data Center
Missouri Public
Service Commission

Exhibit No. 800

Issue: Low Income Assistance Programs

Sponsoring Party: Consumers Council of Missouri

MISSOURI PUBLIC SERVICE COMMISSION

Case Nos. GR-2017-0215 and GR-2017-0216

DIRECT TESTIMONY

of

JACQUELINE A. HUTCHINSON

September 8, 2017

Consumers Council of Missouri Exhibit No. 800
Date 12-7-17 Reporter WLD
File No. GR-2017-0215, GR-2017-0216

DIRECT TESTIMONY

of

JACQUELINE A. HUTCHINSON

Q. PLEASE STATE YOUR NAME, OCCUPATION, AND BUSINESS ADDRESS.

My name is Jacqueline A. Hutchinson, and I am Board President of Consumers Council of Missouri, and Vice President of Operations for People's Community Action Corporation in St. Louis MO.

Q. WHAT IS YOUR EDUCATIONAL BACKGROUND?

. I have a BS degree in Business Administration from Washington University in St. Louis, and a MS degree in Urban Affairs and Policy Analysis, from Southern Illinois University in Edwardsville IL

Q. WHAT IS YOUR WORK EXPERIENCE?

My career spans more than thirty years with Community Action Agencies in the state of Missouri. I have been responsible for implementation of Federal, State and private donation fuel assistance and homeless prevention programs in the St. Louis area. Those programs include the Low-Income Home Energy Assistance Programs (LIHEAP) and Community Services Block Grant (CSBG) programs. I have been actively involved in energy policy issues and advocacy for low-income consumers on a local, state, and national level for more than 30 years. I was founding member, and board member for more than 15 years, of the National Fuel Funds Network (now The National Energy and Utility Affordability

Coalition). I was also a founding member, and Co-Chair of the Committee to Keep Missourians Warm.

I also serve as board member for Consumers Council of Missouri since 2009, and Board President since 2012. In that role, I have presented testimony in rate case hearings on behalf of residential customers, and particularly low-income household energy customers in the St. Louis area. I have given testimony in almost every rate case impacting the St. Louis area utilities since the early 1980s.

Q. CAN YOU GIVE SOME EXAMPLES OF YOUR EXPERIENCE OF WORKING ON LOW-INCOME ENERGY POLICY IN MISSOURI?

The following are examples of my work in the area of low-income energy policy:

Cold Weather Rule and Affordability Plans

I have provided testimony and/or been a part of negotiations in every formal and informal rulemaking involving revisions to the Commission Cold Weather Rule[1] starting in 1984. I have reviewed Percentage of Income Payment Plans, affordability plans and low-income rates that have been proposed in other states and made recommendations on those plans during rate cases and Cold Weather Rule proceedings in Missouri. I have participated in settlement negotiations with several St. Louis utilities, worked with commission's staff, utilities and advocates to develop viable low income affordability programs.

The Governors Energy Policy Council

I was appointed by the Governor as a member of this council. The initial focus of the Council was to prepare a report to be submitted to the Governor by June 1, 2003, focusing on three key areas: An analysis of Missouri's current and future energy supplies and demand and impact on low-income; An analysis of the impact on Missouri of standard market design rules proposed by the Federal Energy Regulatory Commission; and make

[1] Currently found at 4 CSR 240-13-055.

recommendations for how Missouri state government may demonstrate leadership in energy efficiency.

Cold Weather Rule and Long-Term Energy Affordability Task Force

I was an appointed by the Public Service Commission to the Cold Weather Rule and Long-Term Energy Affordability Task Force set up in Case No. GW-2004-0452, and worked with this group to establish agreed upon modifications to the Cold Weather Rule in 2004 that provided additional protections to disabled and low-income families and set standards for low-income energy affordability programs.

Q. FOR WHOM ARE YOU PROVIDING TESIMONY IN THIS PROCEDURE?

I am presenting testimony on behalf of Consumers Council of Missouri. Consumers Council of Missouri builds on its foundation, laid in 1971, to educate consumers statewide and advocate for their collective interests through leadership and partnerships on issues such as utility rates, health care access, personal finance and others as they arise.

Q. **WHAT IS THE PURPOSE OF YOUR TESTIMONY IN THIS CASE?**

My testimony will provide information on the impact of this rate increase on low-income residents in Spire's Laclede Gas service area, and the need for comprehensive utility affordability programs that address this problem. I will also make similar recommendations for comprehensive affordability program models that could be implemented by Spire to benefit low-income customers in its MGE service area.

Q. **WHAT ARE THE MOST RECENT POVERTY STATISTICS IN MISSOURI?**

Missouri's Overall Poverty Rate is approximately 14.8%, however, the Poverty Rate in St. Louis remains higher at 25.5%, and Jackson County poverty rate is 17.7%.

Missouri elderly and disabled residents received a 0.3% increase or $3.00 in Social Security benefits for 2017 and a 0.2% or $2.00 per month increase in 2016.

The average wage increase in Missouri this past year was 3.1%, after seeing declines of 1.6% in 2013, and another .6% in 2014. (see Attachment A "2016 Poverty in Missouri" by Missouri-CAN).

Every day I encounter Missouri families who are struggling to afford their monthly expenses, particularly energy costs. Many such families cannot afford even a modest increase in their current energy burden. "Energy burden" is defined as the percentage of total income spent by a family on their utility bills. On average, Missouri low-income families spend 14% of their income on utilities and 30% on housing cost, while middle-income families spend on average 4% of their income on utilities.

Any increase in residential natural gas utility rates will also further increase the number of elderly in our state who must choose whether to heat their homes or buy to food or medicine.

Q. WHAT IS THE UTILITY UNAFFORDABILTY CRISIS?

The number of households facing unaffordable home energy burdens is staggering in Missouri and even higher in the City of St. Louis. In the dense urban areas of the State, which are served by Spire, it is common to have families with energy burdens that exceed 30% of their income, not including other housing costs. According to the most recent five-year American Community Survey, nearly 164,000 Missouri households live with income at or below 50% of the Federal Poverty Level and face a home energy burden of 27%. And nearly 209,000 additional Missouri households live with incomes between 50% and 100% of the Federal Poverty Level and face a home energy burden of 15%.

In 2016 the total number of Missouri households below 200% of the Federal Poverty Level stayed relatively constant from the prior year.

In an effort to quantify the gap between "affordable" home energy bills and "actual" home energy bills, a model that estimates the "home energy affordability gap" on a county-by-county basis for the entire country was developed by Roger Colton, of Fisher, Sheehan & Colton:

> "Home energy is a crippling financial burden for low-income Missouri households. Missouri households with incomes of below 50% of the Federal Poverty Level pay 27% of their annual income simply for their home energy bills. Home energy unaffordability, however, is not only the experienced by very poor. Bills for households with incomes between 150% and 185% of Poverty take up 7% of income. Missouri households with incomes between 185% and 200% of the Federal Poverty Level have energy bills equal to 6% of income."

Current LIHEAP funding is not adequate to meet the needs of low-income Missourians, and all funding for LIHEAP and Weatherization assistance was completely "zeroed" out in the President's initial budget. Although experts expect there to be some level of funding for these programs for the coming winter, it is very likely that the funding level will decrease this year and in coming years, greatly exacerbating the funding need at the state level where low-income assistance is implemented.

According to the HEAG study, "Existing sources of energy assistance do not adequately address the Home Energy Affordability Gap in Missouri. LIHEAP is the federal fuel assistance program designed to help pay low-income heating and cooling bills. The gross LIHEAP allocation to Missouri was $65.7 million in 2016 and the number of average annual low-income heating and cooling bills "covered" by LIHEAP was 101,018. In comparison, the gross LIHEAP allocation to Missouri in 2015 reached $73.0 million and covered 92,403 average annual bills." (See HEAG fact sheet below as Attachment B).

Many low-income households sacrifice rent payments, medical and dental care, and food in order to make utility payments. In fact, 37% went without medical or dental care, 34% did not fill a prescription or took less than their full dose of prescribed medicine, 19% became sick because the home was too cold and 24% went without food for at least one day in order to pay utility bills.

Q. WHAT ARE YOUR RECCOMENDATIONS TO ADDRESS THE AFFORDABILITY CRISIS BEING EXPERIENCED BY MANY LOW-INCOME SPIRE (LACLEDE & MGE) CUSTOMERS?

The Consumers Council of Missouri recommends that any low-income assistance programs currently administered by Laclede Gas and by MGE be transferred into a new comprehensive program that includes the following components:

A. A heating affordability program that assists qualifying low-income households with meaningful bill credits and program criteria that are designed to prevent arrearages and to keep these natural gas customers current on their bills and continuing to be connected to heating services that are crucial to health and safety.

B. Funding for such a program should be partially funded through the utilities' revenue requirements in these rate cases, be allocated fairly among all customer classes upon a volumetric basis, and ideally supplemented with matching amounts by Spire stockholders.

C. A collaborative should be formed to work out the details of how these programs should be administered. This collaborative should include any interested parties to this rate case, as well as well as non-profit organizations from both service areas who have expertise in implementing low-income energy assistance programs.

D. These programs should be coordinated with any new or existing low-income weatherization programs and energy efficiency programs in partnership with Missouri Department of Economic Development or other program providers.

Q. WHAT FUNDING LEVEL WOULD YOU RECOMMEND FOR THE AFFORDABILITY PROGRAMS?

To address the critical needs of energy unaffordability, I recommend that the total funding be set at $5,000,000 for each Spire company in Missouri (Laclede Gas and MGE).

To the extent that this amount is included in the revenue requirement of each utility, it should be allocated among the customer classes based upon a usage allocation (on a volumetric basis). The energy affordability crisis is a societal problem and so the solution should be based upon contributions from all customer classes and by the utilities themselves.

Q. IS THERE AN EXAMPLE IN MISSOURI OF A PROGRAM THAT INCLUDES EACH OF THE COMPONENTS YOU ARE RECOMMENDING IN THESE SPIRE CASES?

Recognizing that there are differences in needs for electric and gas affordability programs, the Ameren Missouri "Keeping Current" Program is a successful electric company program that has been implemented for several years in Missouri, and it could be used to develop successful natural gas affordability programs for the Laclede Gas and MGE service areas. The Keeping Current program was developed (and continues to be monitored) through a collaborative process. It has been implemented by Ameren Missouri through participating non-profit energy assistance providers since 2010. This program has been evaluated by a third-party, the Apprise Institute for Study and Evaluation, a nationally recognized organization with a long history of preparing evaluations and recommendations for improving such programs.

Q. WHAT HAVE THE APPRISE EVALUATIONS CONCLUDED ABOUT THE KEEPING CURRENT PROGRAM?

The findings below are outlined in the 2016 program evaluation done by Apprise Institute for Study and Evaluation:

Impacts

The Keeping Current Program had positive impacts for customers who maintained service for a year after enrollment.

1. *Vulnerable Households – The Keeping Current and Keeping Cooling Programs do a good job of serving vulnerable households.*

Across all program elements, 94 percent of active participant had an elderly or disabled household member or a young child.

2. *Payment Troubled Households – The Keeping Current year-round programs serve customers who have had significant problems meeting the Ameren bill payment responsibilities.*

   While 74 percent of the active electric heat participant entered with arrearages of over $250 and 31 percent with arrearages over $1,000, 84 percent of the active alternative heat participants entered with arrearages of over $250 and 28 percent with arrearages over $1,000.

Affordability – The program has improved affordability, but participants still face high energy burdens.

Electric heat participants had their energy burdens decline from 27 percent in the year prior to enrollment to 22 percent in the year following enrollment. While this is a significant decline, it still represents an unaffordable energy bill. Alternative Heat participants had their mean energy burden decline from 24 percent to 23 percent.

1. *Bill Payment – The program had positive impacts on payment regularity and bill coverage rates for the year-round participants.*

   The impact analysis found that customers improved their payment regularity and covered a greater percentage of their bills. Electric heat participants averaged seven payments in the pre-enrollment period and had a net increase of about two payments following enrollment. Alternative heat participants averaged about six payments in the pre-enrollment period and had a net increase of about five payments following enrollment.

   Electric Heat participants had a net increase in total coverage rate of six percentage points and Alternative Heat participants had a net increase of 15 percentage points.

2. *Energy Assistance – Participants were less likely to receive LIHEAP and other energy assistance than they were prior to Keeping Current participation. Agency caseworkers should be encouraged to provide more assistance to participants with program applications.*

   Electric Heat and Alternative Heat participants were less likely to receive LIHEAP and other energy assistance in the post-enrollment period. While 67 percent of Electric Heat participants received LIHEAP in the pre-enrollment period, 40 percent received it in the post period, a 48-percentage point net reduction because of the increase seen in the nonparticipant group. Alternative Heat participants also experienced a large reduction. This is problematic, as agencies should be working with participants to ensure that they apply for LIHEAP again following Keeping Current enrollment.

3. *Collections Impacts – The program has resulted in reduced collections actions and service terminations.*

   Both the Electric Heat and Alternative Heat participants had a large net reduction in disconnect notices, service terminations, and payment arrangements following the program enrollment. While service terminations declined by 14 percent points for Electric Heat participants, they declined by 15 percentage points for Alternative Heat participants.

Program Benefits

- Bill Credits: Keeping Current participants are required to make on-time monthly payments equal to the amount due minus the Keeping Current credit to receive their monthly credit. The percent of participants who received program credits declined over the year following program enrollment. While 72 percent of the participants in the analysis group received the Keeping Current credit in the first month after enrollment, the percent declined each month, until only 46 percent received a credit in the twelfth month following enrollment.

- Benefit Amount: Total bill credits averaged $600 for the Electric Heat participants, $145 for the Alternative Heat participants, and $73 for the Cooling participants. Electric heating customers received much higher benefits than what was seen in the initial program implementation and somewhat higher than in the 2013 participant evaluation.

- Arrearage Reduction: While 69 percent of the participants in the analysis group received arrearage forgiveness in the first month after enrollment, the percent declined each month, until only two percent received the reduction in the twelfth month. Participants who had the arrearages at enrollment received a mean of $331 in arrearage reduction in the year following enrollment.

Affordability

- Payment Obligation: Both the Electric and Alternative Heat participants reduced their payment obligation due to the Keeping Current credits.

- Energy Burden: Electric heat participants had their energy burdens decline from 27 percent in the year prior to enrollment to 22 percent in the year following enrollment. While this is a significant decline, it still represents an unaffordable energy bill.

Bill Payment Impacts

- Number of Customer Payments: The program resulted in an increase in payment regularity. Electric heat participants averaged seven payments in the pre-enrollment period and had a net increase of about two payments following enrollment. Alternative heat participants averaged about six payments in the pre-enrollment period and had a net increase of about five payments following enrollment.

- At the time of enrollment, active participants in the year-round programs had an average outstanding account balance of about $900.

Collections Impacts

- Both the Electric Heat and Alternative Heat participants had a large net reduction in disconnect notices, service terminations, and payment arrangements following program enrollment. Service terminations declined by about 14 percent points for the year-round participants.

Q. WHAT ARE SOME BEST PRACTICES IMPLEMENTED BY ENERGY UTILITY COMPANIES IN OTHER STATES TO ADDRESS UNAFORDABILITY?

The following are just a few selected examples of programs that have been adopted in other states to address energy unaffordability:

California

Low-income customers of the state's three large investor-owned utilities who are enrolled in the California Alternative Rates for Energy (CARE) program receive a 20% discount on their electric and natural gas bills. For one- and two-person households, the maximum income is $29,300. The maximum increases with household size, e.g., $34,400 for a three-person household.

The Family Electric Rate Assistance (FERA) program can provide a discount on electricity costs for households with three or more persons with somewhat higher incomes. Households qualify if they receive benefits under various welfare programs, including Temporary Assistance for Needy Families, food stamps, Medicaid, and energy assistance. Alternatively, a household is eligible if its income falls within certain limits, e.g., $34,401 and $43,000 for a three-person household.

In California, the electric rate that a household is charged depends on how its consumption compares with a baseline, which varies by region and other factors. Households that participate in FERA are charged Tier 2 rates that normally apply to consumption at 101% to 130 % of baseline for their Tier 3 usage (131% to 200% of baseline). The program does not affect the rates charged for higher levels of consumption. These provisions are funded through a rate surcharge paid by all utility customers.

Ohio

The state's Percentage of Income Payment Plan (PIPP) requires regulated gas and electric companies to accept payments based on a percentage of household income. The Office of Community Services administers the program for electric customers and community action agencies for gas customers. The program is funded by the universal service charges on electric and gas bills.

To be eligible for the program, a customer must (1) receive his or her primary or secondary heat source from a utility company regulated by the Public Utilities Commission of Ohio, (2) have a total household income at or below 150% of the federal poverty level, and (3) apply for all energy assistance programs for which he or she is eligible.

Customers whose primary heating source is electricity make a monthly payment to their electric company that is 15% of their gross monthly household income in billing periods that include any usage from November 1 through April 15. The rest of the year, these households pay 15% of their gross monthly household income or their current electric bill, whichever is greater. Customers who use electricity to control their gas or oil furnace or have electric space heaters in addition to another heating source make an electric PIPP installment that is 5% of their income in the heating season. During the rest of the year, the household pays 5% of its income or its current electric bill, whichever is greater. (Most households whose income is at or below 50% of the federal poverty level and use electricity as its secondary source of heat, pay only 3% of their income during the heating season). Cleveland Electric Illuminating and Toledo Edison do not offer the 3% provision. Instead, they offer very low-income customers a 7% discount off their electric bills.

Customers whose primary heating source is natural gas pay their gas company an installment that is 10% of their gross monthly household income, year-round. Customers who use natural gas as their secondary heating source pay the company 5% of their income year-round.

Participating customers must (1) make the required monthly payments, 2) re-verify their gross monthly household income at least once every 12 months, (3) reapply for all available energy assistance programs at least once every 12 months, and (4) apply for weatherization if contacted by a utility or state agency representative. People who apply for the Emergency Heating Assistance Program must also apply for PIPP or another payment plan.

Pennsylvania

Pennsylvania's Public Utility Commission requires major electric and gas companies to provide Customer Assistance Programs (CAPs) for their low-income customers. Some programs provide flat rate discounts or bill credits, while others provide discounts that are tied to the customer's income. For example, PECO, which serves the Philadelphia area, provides four discounted rates to its low-income electric and gas customers (those with incomes of up to 150% of the federal poverty level). The percentage of discount is based on the customer's gross household income. Other companies have arrearage forgiveness in their programs. For example, Duquesne, which serves the western part of the state, requires customers who participate in CAP to go on a payment plan and make on-time monthly payments. Customers are forgiven 1/36 of their arrearage amount each monthly payment that is on time and complete.

Texas

The LITE-UP program provides an electric rate discount of about 2 cents per kilowatt-hour during the cooling season for low–income families. This reduces the electric bills of participating families by about 15% from July through October, an average savings of $25 to $30 per month.

A customer qualifies for the discount if his or her family income is at or below 125% of federal poverty level guidelines or if the customer gets certain benefits from the Health and Human Services Commission. These benefits include food stamps, Temporary Assistance to Needy Families, Supplemental Security Income, Medicaid, or low-income Medicare.

The Public Utility Commission reports that there are 316,000 households who are automatically enrolled in the program. This system is operated by the Low-Income Discount Administrator (LIDA) and uses data provided by the Texas Health and Human Services Commission and retail electric providers to identify eligible customers. In addition, other households that believe they are eligible can apply directly to LIDA. The discount is only for the summer months and will be available again during the summers of 2008 and 2009.

In addition to the rate discount, participating customers cannot be charged late fees under Public Utility Commission rules. Participants are also eligible to pay security deposits over $50 in two installments.

Public Power Utilities

Several public power utilities (which generally are not regulated by state public utility commissions) offer discounted rates to low-income customers. For example, the Cowlitz County (Washington) Public Utility District offers a reduced electric rate for qualified seniors aged 65 or older. Households with a gross income below $13,691 receive a 20% rate discount; those with incomes between $13,692 and $20,535 receive a 10% discount. The district also offers the same discounts to low-income households with a disabled household member. The Los Angeles Division of Water and Power offers a discount of up to 15% for electric and water customers with eligibility standards similar to the CARE program described above. Seattle City Light (the municipal electric utility) provides a 50% rate discount for eligible customers. Customers who are 65 or older or who are disabled qualify if their income is below to 70% of the area median (i.e., $42,600 for a three-person household). Other customers are eligible if their income is below 200% of the federal poverty level. The program is open to homeowners and renters, but not to residents of subsidized housing.

Q. DOES THIS END YOUR TESTIMONY?

Yes.

Attachment A

2016 State of the State

Poverty in Missouri

Missourians to End Poverty

Bringing the Community Together to End Poverty

food • health • education • housing & energy • economic & family security

Data Sources

1. U.S. Census American Community Survey 1 Year Poverty Statistics: Table S1701 for years: 2005-2014

2. 2014 U.S. Census Small Area Income & Poverty Estimates, Missouri Counties, December 2015 via: http://www.census.gov/did/www/saipe/data/interactive/saipe.html?s_appName=saipe&map_yearSelector=2014&map_geoSelector=aa_c&s_state=29&menu=grid_proxy

3. How Census Measures Poverty. Retrieved from: http://census.gov/library/infographics/poverty_measure-how.html

4. Short, K. The Supplemental Poverty Measure: 2014. Retrieved from: http://www.census.gov/hhes/povmeas/methodology/supplemental/overview.html

5. United States Department of Health and Human Services via: https://aspe.hhs.gov/2015-poverty-guidelines

6. 2014 U.S. Census Small Area Income & Poverty Estimates, Under Age 18 in Poverty, December 2015, via: http://www.census.gov/did/www/saipe/data/interactive/saipe.html?s_appName=saipe&map_yearSelector=2014&map_geoSelector=aa_c&s_state=29&menu=grid_proxy&s_measures=u18_snc

7. Coleman-Jensen, A; Rabbitt, M; Gregory, C; Singh, A. "Household Food Security in the United States in 2014". Economic Research Service, USDA. Retrieved from: www.ers.usda.gov/media/1896841/err194.pdf

8. KEY FINDINGS from Hunger in America 2014 for the State of Missouri. Retrieved from: http://feedingmissouri.org/hunger-in-missouri/missouri-hunger-facts

9. Missouri FSD Annual Report. FY 2014. Food Stamps, Average Monthly Caseload and Annual Benefits Issued. Retrieved from: http://dss.mo.gov/re/fsdar.htm

10. MACA CCNA Tool. Source: Missouri Department of Elementary & Secondary Education. Free/Reduced Lunch Program 2012-13. Source geography: County

11. American Community Survey. 2014 Health Insurance Coverage Status. Retrieved from: http://factfinder.census.gov/faces/tableservices/jsf/pages/productview.xhtml?pid=ACS_14_1YR_S2701&prodType=table

12. Institute for Health Metrics and Evaluation (IHME). US Health Map. Seattle, WA: IHME, University of Washington, 2015. Retrieved from http://vizhub.healthdata.org/us-health-map/

13. "Mental Health and Chronic Diseases" (2012). CDC Division of Population Health. Retrieved from: http://www.cdc.gov/nationalhealthyworksite/docs/Issue-Brief-No-2-Mental-Health-and-Chronic-Disease.pdf.

14. "Missouri State Epidemological Profile" (2015, April). Missouri Department of Mental Health (p. 49,51). Retrieved from http://dmh.mo.gov/ada/mobhew/docs/missouristateepiprofile2015.pdf

15. The National Campaign to Prevent Teen and Unplanned Pregnancy. Retrieved from: https://thenationalcampaign.org/data/state/missouri

16. Missouri Department of Health. Missouri 2009-2013 Women's Reproductive Health Profile Teen Pregnancy Rate Under Age 18. Retrrieved from: http://health.mo.gov/data/mica/ASPsPFP/mapHiLo.php?&cod=071168&qtile=3&yr=2009-2013

17. "Relationships Between Housing and Food Insecurity, Frequent Mental Distress, and Insufficient Sleep Among Adults in 12 US States, 2009." via: www.ncbi.nlm.nih.gov/pmc/articles/PMC3958143/

18. America's Health Rankings United Health Foundation. Retrieved from: http://www.americashealthrankings.org/MO

19. Harvard University. Center on the Developing Child. "Toxic Stress" Retrieved from: http://developingchild.harvard.edu/science/key-concepts/toxic-stress/

20. Trends in College Pricing 2015. CollegeBoard.org. Retrieved from http://trends.collegeboard.org/ - Data in Excel - Table 5

21. Chronicle of Higher Education. Retrieved from: http://collegecompletion.chronicle.com/state/#state=mo&sector=public_four

22. MACA CCNA Tool. Educational Attainment Table. Source: Missouri Department of Elementary & Secondary Education. 2014. Source geography: County

23. MACA CCNA Tool. High School Graduation Rates Table. Source: Missouri Department of Elementary & Secondary Education. 2014. Source geography: County

24. Bureau of Labor Statistics. Employment Projections. Earnings and unemployment rates by educational attainment. December 8, 2015. Retrieved from: http://www.bls.gov/emp/ep_chart_001.htm

25. Institute of Education Sciences - National Center for Education Statistics. The Nation's Report Card - 2015 Reading and Math State Snapshots for 4th and 8th grades.

26. MACA CCNA Tool. Tables for Housing Affordability and Fair Market Rent. Data Source: National Low Income Housing Coalition. 2014. Source geography: County

27. MACA CCNA Tool. Greater than 50% of Income Paid Towards Rent/Mortgage Data Source: US Census Bureau, American Community Survey. 2009-13. Source geography: County

28. MACA CCNA Tool. Overcrowded Housing Table. Data Source: US Census Bureau, American Community Survey. US Census Bureau, Decennial Census. 2009-13. Source geography: County

29. U.S. Census Definition of Overcrowding. Retrieved from: http://www.census.gov/hhes/www/housing/census/historic/crowding.html

30. LIHEAP Households Served in FY 2014 (2015). LIHEAP Clearinghouse, U.S. Department of Health & Human Services. Retrieved from http://www.liheapch.acf.hhs.gov/profiles/Missouri.htm.

31. American Coalition for Clean Coal Energy. "Energy Cost Impacts on American Families, 2001-2014". www.americaspower.org.

32. American Institutes for Research. The National Center on Family Homelessness. Retrieved from: http://www.familyhomelessness.org/children.php?p=ts

33. MACA CCNA Tool. Homeless Children Table. Source: Missouri Department of Elementary & Secondary Education. 2013. Source geography: County

34. Working Poor Families Project State Data Snapshot. Retrieved from: http://www.workingpoorfamilies.org/states/popups/missouri.html

35. 2013 FDIC National Survey of Unbanked and Underbanked Households Appendices. October 2014. Retrieved from: http://scorecard.assetsandopportunity.org/latest/measure/unbanked-households

36. The Institute for College Access and Success. Missouri 4-year and above tables. Average debt of graduates and percentage with debt. Retrieved from: http://college-insight.org/#explore/go&h=c78eaf97fc797bfdcfe02e04cf15aacc

37. Missouri Economic Research and Information Center. Unemployment Rate November 2015. Retrieved from: https://missourieconomy.org/indicators/unemp/index.stm

38. US Census Bureau, Small Area Income & Poverty Estimates. 2014. Median Household Income. Retrieved from: http://www.census.gov/did/www/saipe/data/interactive/saipe.html?s_appName=saipe&map_yearSelector=2014&map_geoSelector=aa_c&s_state=29&me

39. MACA CCNA Tool. Source: The Brookings Institution & IRS-SPEC, Brookings Earned Income Tax Credit Interactive. 2012. Source geography: County

40. Asset Poverty Rate. Assets and Opportunity Scorecard. Retrieved from: http://scorecard.assetsandopportunity.org/2014/measure/asset-poverty-rate

41. Pew Charitable Trusts. Economic Mobility in the United States. July 2015.

42. Brookings Institute. "Facts on poverty and opportunity that progressives and conservatives can agree on." December 2015. Retrieved from: http://www.brookings.edu/research/papers/2015/12/aei-brookings-poverty-and-opportunity-chapter-two-facts

43. Missouri Department of Social Services Caseload Counter Historical Data. Averages 12 month from December 2014 to November-2015. Retrieved from: http://dss.mo.gov/mis/clcounter/history.htm (historical caseload in Excel format)

44. "Missouri Fact Sheet: Federal Rental Assistance." (2015, August 31). Center on Budget and Policy Priorities. Retrieved from: http://www.cbpp.org/research/housing/national-and-state-housing-data-fact-sheets?fa=view&id=3586#map

45. Federal Funding and unded Enrollment by State FY 2014. Retrieved from: http://eclkc.ohs.acf.hhs.gov/hslc/data/factsheets/2014-hs-program-factsheet.html

46. U.S. Census American Community Survey 1 Year Poverty Statistics: Table S1701 for 2014 all states. http://factfinder.census.gov/faces/tableservices/jsf/pages/productview.xhtml?pid=ACS_14_1YR_S1701&prodType=table

Missouri Association for community Action

Helping people. Changing Lives.

This report was compiled in collaboration with the Missourians to End Poverty Coalition by the Missouri Association for Community Action. The Missouri Association for Community Action used their proprietary Community Needs Assessment Tool (MACA CCNA Tool) which pulls data from a wide variety of public sources. For more information on the Community Needs Assessment Tool, visit us on the web at **www.CommunityAction.org**.

Missouri Report on Poverty 2016

What is the State of the State?

This report exists to provide a comprehensive snapshot of poverty in our state. It is the hope of the Missourians to End Poverty Coalition that by presenting the facts surrounding poverty, a better understanding of the realities of this issue can be achieved. In the end, all Missourians deserve the opportunity to thrive, but to reach that goal, the issues need to be clearly defined and understood by all.

Missourians to End Poverty has identified five key factors that impact poverty in the state. These indicators guide the advocacy work of the coalition. These factors are: Food; Health; Education; Housing & Energy; and Family & Economic Security. Together, these factors highlight poverty's interconnected nature and the need for multi-dimensional solutions.

Missouri is a state rich in natural beauty and individual success, in opportunities for education and employment, in security and health, and in values and vision. However, the state's poverty rate is 15.5% overall and over 21% for children. In real numbers, poverty in Missouri impacts over 908,628 individuals, and 287,081 of those are children who have little control over their situation. As Nelson Mandela said, "Overcoming poverty is not a gesture of charity. It is the protection of a fundamental human right, the right to dignity and a decent life."

"It is the protection of a fundamental human right, the right to dignity and a decent life."

Who are Missourians to End Poverty?

Missourians to End Poverty is a coalition of various individuals, advocates, businesses, faith-based organizations, non-profits and government agencies who have come together around the following vision: ***As Missourians, we envision a just society of shared responsibility by individuals, communities, business, and government in which all individuals are respected, have opportunities to reach their full potential, and participate in thriving, diverse, sustainable communities.***

Missouri has many citizens who are working to achieve the "American Dream." It is clear, however, that many of our state's residents are falling short of that goal. Missourians to End Poverty members strive to make a difference by coming together to educate people about the impact of poverty and by advocating statewide on behalf of low-income families.

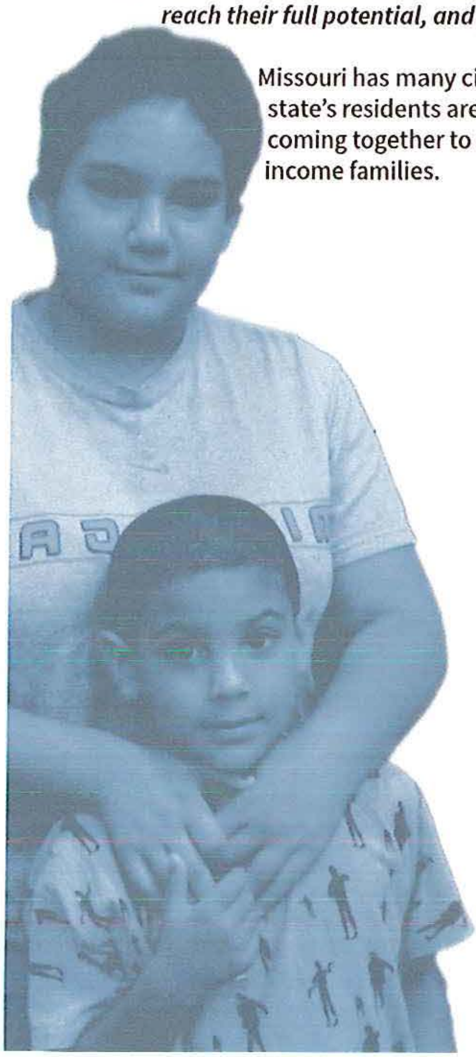


Table of Contents

Poverty in Missouri 2

Food 4

Health 5

Education 6

Housing & Energy 7

Family & Economic Security 8

Additional Poverty Information 9

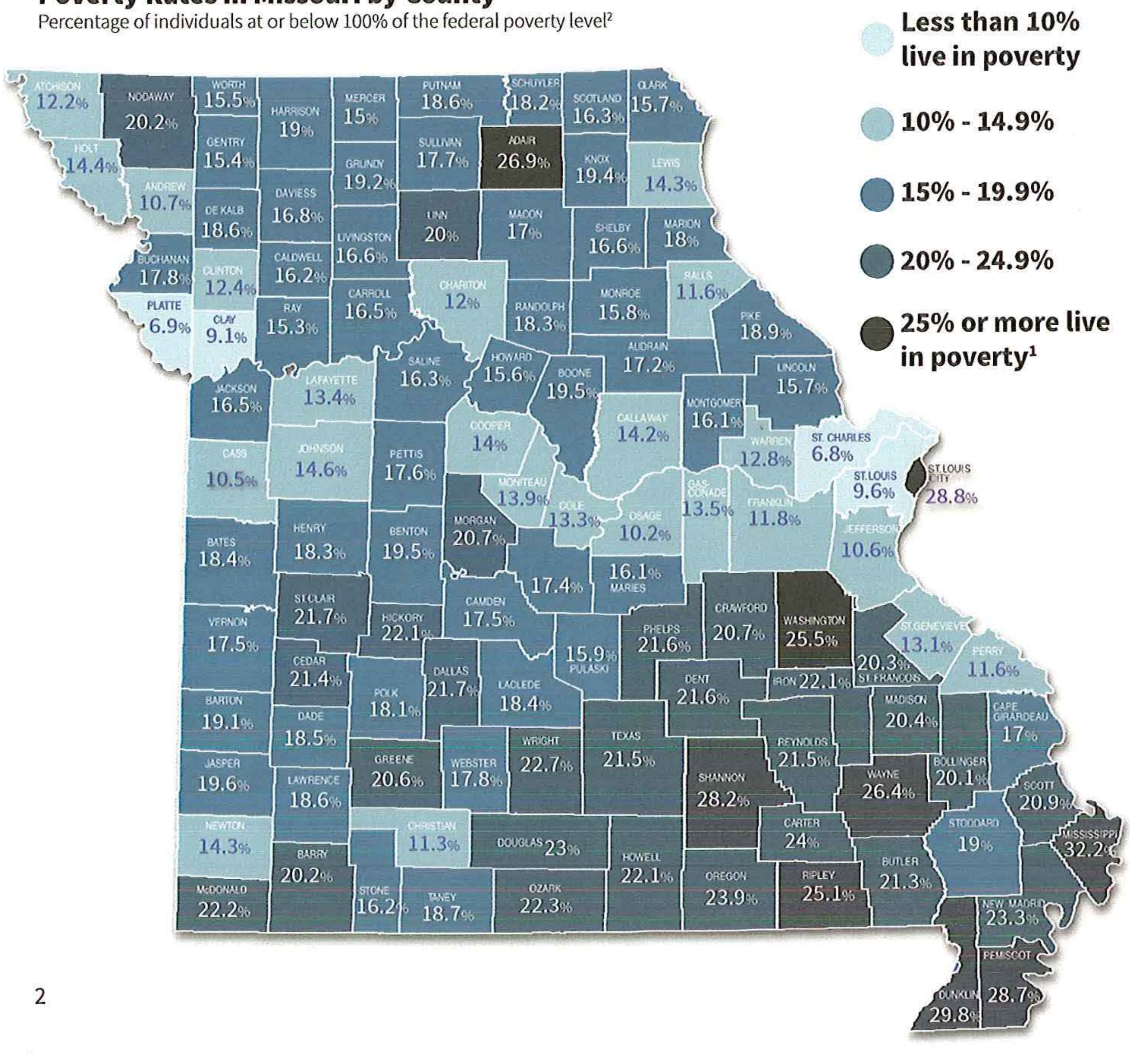
Poverty in Missouri

Poverty Rates in Missouri over the Last 10 Years

While the poverty rate has declined in the past few years, Missouri still has a long way to go to eradicate poverty. In 2005, poverty impacted 748,023 people, today it impacts 908,628 people.[1]

Poverty Rates in Missouri by County

Percentage of individuals at or below 100% of the federal poverty level[2]



Poverty in Missouri

Official Poverty Measure*

The current official poverty measure was developed in 1963 and is based upon the cost of the minimum food diet for various family sizes in today's prices multiplied by 3. This official poverty calculation does not take into account the value of federal benefits, such as those provided by the Supplemental Nutrition Assistance Program (SNAP), housing, or energy assistance. Neither does it account for typical household expenses such as work expenses or child care.

Supplemental Poverty Measure

The Supplemental Poverty Measure includes:

- Family resources such as income
- Benefits such as SNAP, subsidized housing and Low-Income Home Energy Assistance Program (LIHEAP)

And subtracts:

- Expenses for necessary goods and services such as housing, income taxes, social security payroll taxes, child care and other work-related expenses, child support payments to another household, and health insurance premiums[3]

While the Supplemental Poverty Measure shows that poverty is higher than the Offical Measure for adults and seniors, it shows a significant reduction in poverty rates for children under 18.

In 2014, the child poverty rate under the Offical Measure was 21.5%, but under the Supplemental Measure, it was only 16.7%.[4]

*For the purposes of this report, unless otherwise noted, the official poverty measure is referenced.

Missouri Population
for whom poverty status is determined[1]

5,878,658

Missourians at or below 100% of the Federal Poverty Level[1]

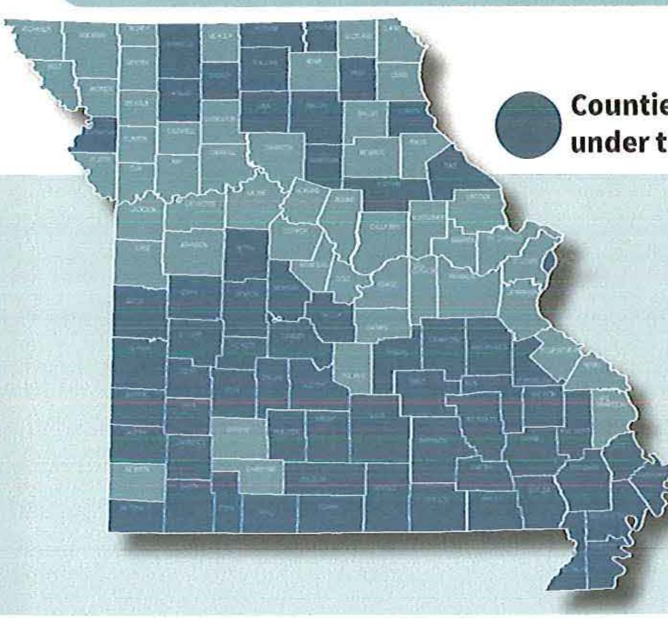
908,628

287,081 Children in Poverty[1]

2015 POVERTY GUIDELINES
100% of Federal Poverty Level

Family Size	Annual Income
1	$11,770
2	$15,930
3	$20,090
4	$24,250
5	$28,410
6	$32,570

For families/households with more than 6 persons, add $4,160 for each additional person.[5]



Counties in which 25% or more of children under the age of 18 live in poverty[6]

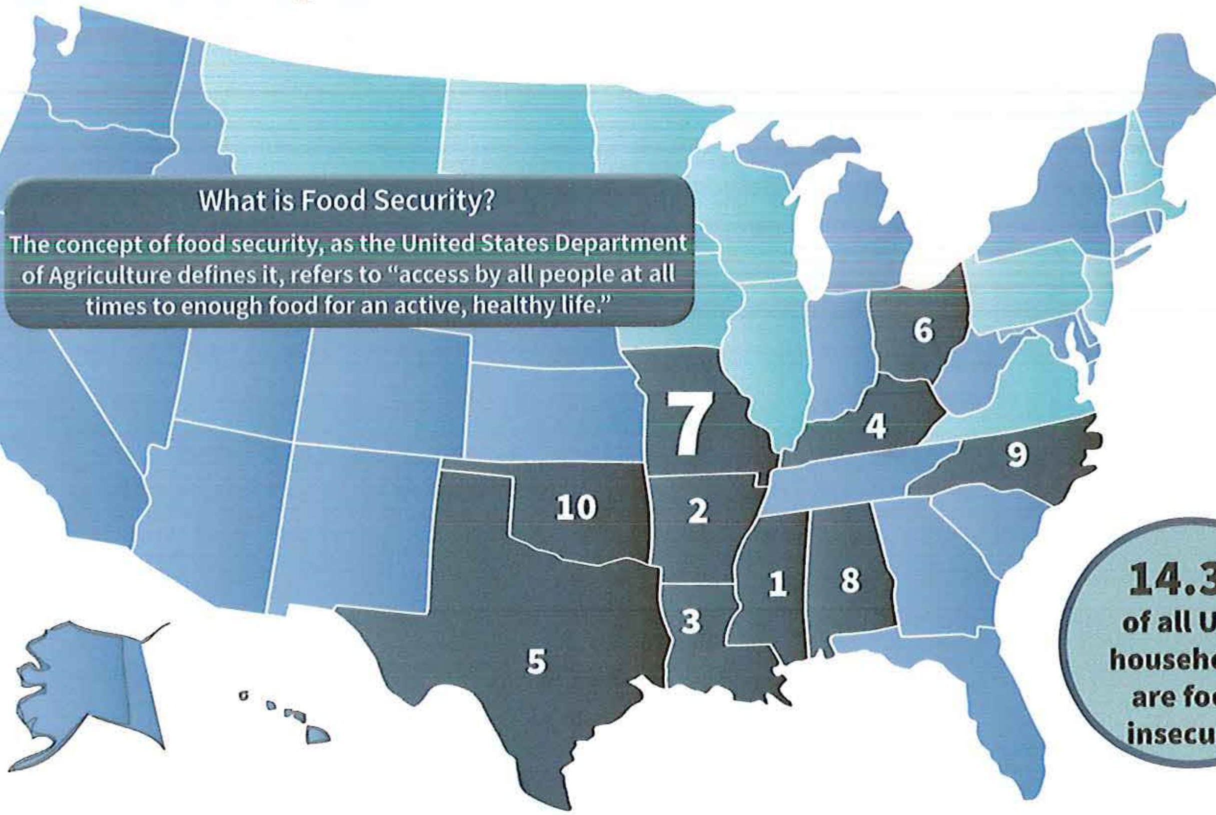
Child Poverty in Missouri

Counties with child poverty rates over 40%[6]

Shannon	**47.8%**
St. Louis City	**42.9%**
Dunklin	**41.5%**
Wayne	**40.8%**
Pemiscot	**40.2%**
Mississippi	**40.1%**

Food

10 States with the Highest Rates of Food Insecurity[7]



What is Food Security?

The concept of food security, as the United States Department of Agriculture defines it, refers to "access by all people at all times to enough food for an active, healthy life."

14.3% **of all U.S. households are food insecure**[7]

Missouri has the seventh highest food insecurity rate in the country, with **16.8%** of its population classified as food insecure. In addition, **7.9%** of Missourians have ***very low food security***, meaning there are *"multiple indications of disrupted eating patterns and reduced food intake."*[7]

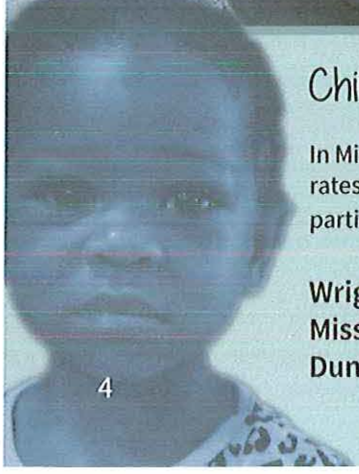
1,190,600 Missourians visited a local food bank in 2014.[8]

879,122 Missourians utilized the Supplemental Nutrition Assistance Program (SNAP) in 2014. The average monthly benefit per person was **$122**.[9]

Children and Food

In Missouri, 77 counties have free/reduced lunch participation rates higher than 50%. The following counties have the highest participation rates.[10]

Wright County	93.87%	Pemiscot County	81.91%
Mississippi County	78.92%	Scott County	78.52%
Dunklin County	78.27%	Reynolds County	77.22%



441,329 kids on free/ reduced lunch

In 2014, 893,378 students enrolled in public school lunch programs. Of those, 49.4% qualify for free/ reduced lunch.[10]

Health

Access to Health Insurance

693,878 or **11.7%** Missourians still do not have insurance. Most Missourians access health care with employer-provided insurance, but in our system of employer-provided insurance, those at the lowest levels of income are rarely provided coverage by their employer. [11]

693,878
Missourians Uninsured

This creates a system in which low-income families often pay out of pocket for health care, while higher income individuals receive employer subsidies. This system impedes the ability of low-income individuals to access primary and preventative care, increasing health care costs for all Missourians.

Poverty + Projected Life Expectancy

Missourians who live in counties with lower poverty rates can expect to live up to **7.5 years longer** than those with higher poverty rates.

Missouri Counties w/ LOWEST POVERTY RATE[2]	Life Expectancy*	Missouri Counties w/ HIGHEST POVERTY RATE[2]	Life Expectancy*
6.8% - St. Charles	80.5 years	32.2% - Mississippi	72.9 years
6.9% - Platte	80.3 years	29.8% - Dunklin	71.6 years
9.1% - Clay	79.5 years	28.8% - St. Louis City	74.5 years

*Projected life expectancy average for male and females at birth in 2013[12]

Poverty + Teen Pregnancy

Poverty is often an outcome of teenage pregnancy, not only for the pregnant teen, but for the teen father and the child.

However, poverty is also a factor that leads to teen pregnancy.

There were **5,232** teen births in 2014. [15] In addition, there are **15 counties** in Missouri with higher than national average birth rates to teen mothers.[16]

Poverty + Mental Health

Lack of access to health care leads to lack of treatment for both physical and mental illnesses. Those struggling with mental illness are at higher risk for chronic conditions including cardiovascular and respiratory diseases and substance abuse disorders.[13]

Mental health has many indicators from substance abuse and anxiety, to suicide and stress. Rates for having at least one major depression episode are higher in Missouri than nationally.[14]

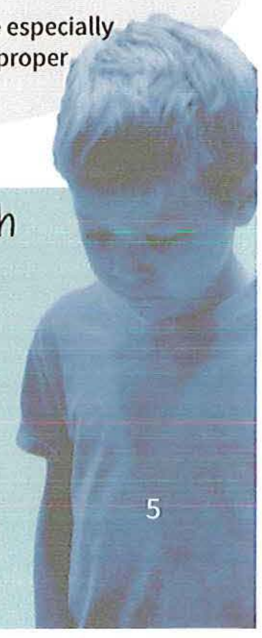
Food insecure families are at a higher risk for chronic diseases, diabetes, hypertension and weight gain. "Studies indicate that food insecurity is associated with psychological distress, anxiety, and depression among low-income women and children."

These physical and mental health effects are especially detrimental due to the lack of access to proper medical care.[17]

Children and Health

Children with supportive adult relationships learn how to cope with adversity in a healthy way. The term "toxic stress" describes issues in child development that may occur when a child experiences strong, frequent, and prolonged adversity without adequate adult support.

This kind of prolonged activation of the stress response systems can disrupt the development of brain architecture and other organ systems. It also increases the risk for stress-related disease and cognitive impairment, well into the adult years.[19]



Education

Although education is a key strategy for poverty reduction, significant barriers exist for low-income students.

The cost of tuition for college keeps rising. The current average in-state cost for tuition and fees at a public 4-year institution in Missouri is **$8,564** per year.[20]

In Missouri, **32.3%** of college students graduate in 4 years. Another **22.9%** graduate after 6 years.

However, **44.8%** of Missouri's enrolled college students do not graduate at all.[21]

Students who do not finish college typically face significant financial barriers.

6,296 Missouri High School students did not graduate in 2014.[23]

12.4% of Missourians have no high school diploma

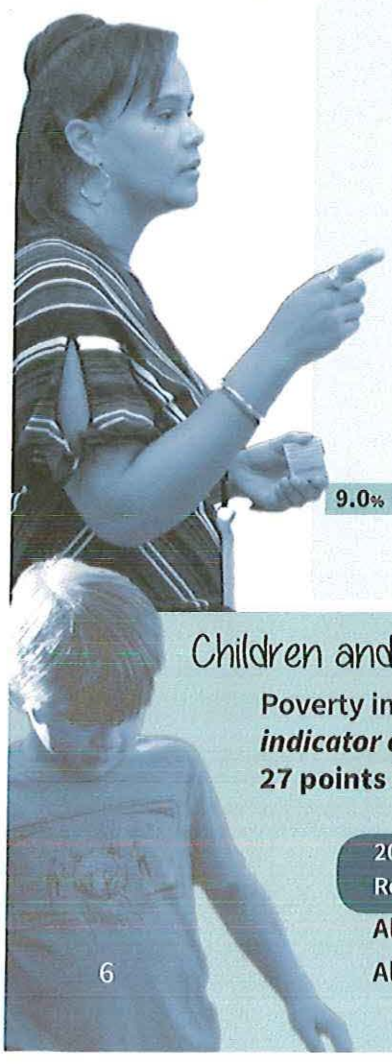
16.4% of Missourians have a Bachelor's degree.

9.8% of Missourians have a Graduate or Professional degree.[22]

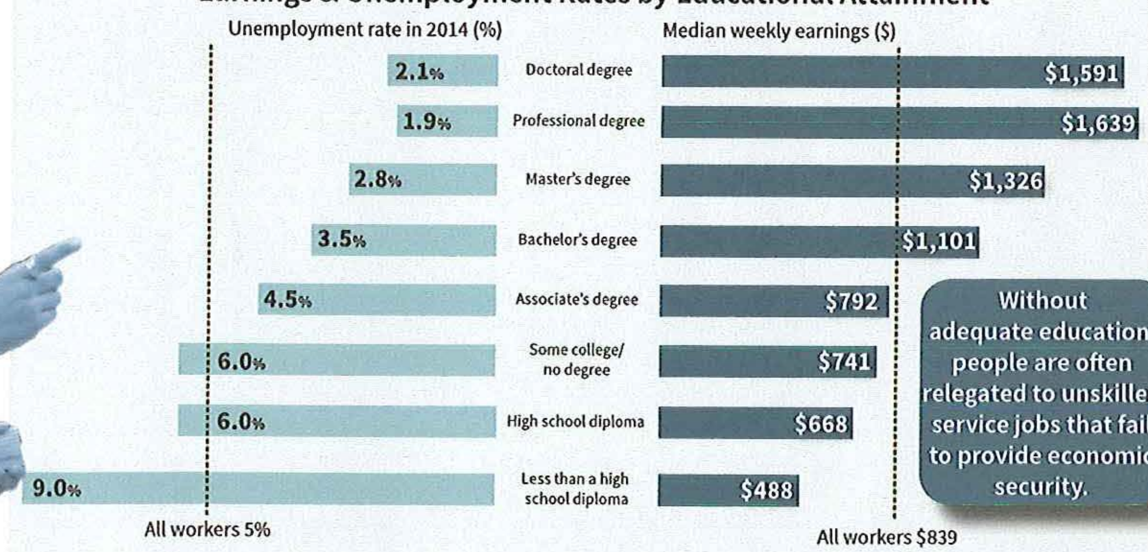
90.15% **High School Graduation Rate**[23]

Missouri's high school graduation rate is good, but some counties struggle to retain students.[23]

St. Louis City	71.81%
Ralls	80.00%
Jackson	84.85%
Pemiscot	85.19%
Callaway	85.87%



Earnings & Unemployment Rates by Educational Attainment[24]



Without adequate education, people are often relegated to unskilled service jobs that fail to provide economic security.

Children and Education

Poverty impacts learning. For children who were eligible for free/reduced lunch - ***a key indicator of child poverty*** - the average scores for math and reading proficiency were **21 to 27 points lower** than students who were not eligible.[25]

2015 Missouri Snapshot Report - All Students	Below National Basic Reading Level	Below Basic National Math Level
All 4th Grade Students	30% of students	18% of students
All 8th Grade Students	23% of students	29% of students

21.1% of all Missouri children live in poverty[1]

Housing & Energy

Housing

Substandard housing is another barrier that low-income families face. Older homes tend to have issues with energy efficiency, electrical and plumbing problems that require expensive maintenance, and reduced air quality. A household is considered "cost burdened" if more than 30% of their income goes towards housing.

Lowest Average Rent for a 2-bedroom	Highest Average Rent for a 2-bedroom		Hourly wage needed to afford lowest average rent	Hourly wage needed to afford highest average rent
$604 per month	**$891 per month**	**$14.31 Average Housing Wage**	**$11.46 per hour**	**$16.38 per hour**

23.02% renters paying more than 50% of income on housing

8.38% owners paying more than 50% of income on housing[27]

Average Fair Market Rent (FMR) for a two-bedroom apartment is $656 in Missouri. The range for rent on a two bedroom runs from approximately $604 per month in 56 Missouri counties to $891 per month in 8 Missouri counties. The amount of money a household must earn to afford Fair Market Rent in an area (at the accepted 30% limit of income for housing costs) ranges from $11.46 per hour for a two bedroom unit to $16.38 per hour. The statewide average housing wage for Missouri is $14.31 for a household to afford fair market rent on a two bedroom unit.[26]

2000
2.1 million housing units
3,211
were overcrowded

2013
2 million housing units
39,126
were overcrowded

Overcrowded housing In Missouri
1118.49% Increase[28]

Occupied dwellings with more than one person per room are considered overcrowded[23]

Energy

2001
Energy Costs Averaged 16% of Household Budget

2014
Energy Costs Averaged 26% of Household Budget

For households earning less than $30,000 per year

The Low-Income Home Energy Assistance Program (LIHEAP) assisted over **140,230 households** in Missouri in 2014.[30] Most of these households include young children, disabled individuals, or elderly.

For households earning less than $30,000 per year, energy costs increased an average of **10%** from 2001 to 2014.[31]

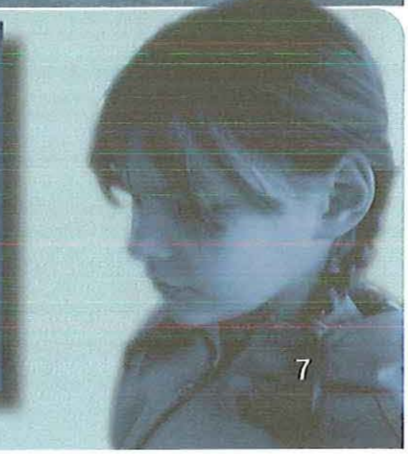
Children and Housing & Energy

Nationally, 83% of homeless children have been exposed to at least one serious violent event by the age of 12, and almost 25% have witnessed acts of violence within their families.[32]

2009-2010
18,775
homeless children

71.7% Increase

2013-2014
32,242
homeless children[33]



Family & Economic Security

Missouri households with no bank account
8.90%[35]

Average college graduate debt
$25,844[36]

Percentage of graduates with debt
59%[36]

A variety of factors impact family and economic security. Many of these issues are related to the local economy and availabilty of employment.

4.7%
Average statewide unemployment rate
November 2015[37]

28.3%

Living Wage

28.3% of jobs in Missouri are in occupations paying wages below the federal poverty guideline of $24,250 for a family of 4.[34]

• **Minimum wage for Missouri is**	**$7.65 per hour**
• **40 hours per week at minimum wage**	**$306 per week**
• **Minimum wage employment annually**	**$15,912 per year**

Median Income Levels[38]

Median household income	Statewide Average	$48,288
Highest median household income	St. Charles County	$74,220
Lowest median household income	Shannon County	$27,382

95 **Counties have median incomes below the state average**[38]

Earned Income Tax Credits

The Earned Income Tax Credit (EITC) is a refundable tax credit for low- to moderate-income working individuals. It is the largest poverty reduction program in the U.S.[39]

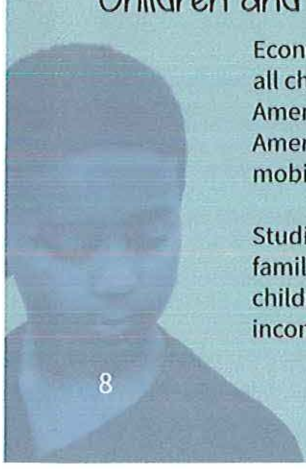
Missouri Tax Returns	Total Claiming EITC	Average EITC $
2,522,030	506,775	$2,324

Asset Poverty

Asset poverty defines how much of a financial cushion a household needs to weather a financial crisis such as a job loss or medical problem. The conservative average savings needed is three months' living expenses at the poverty level and is based on net assets such as savings and durable assets which can be liquified such as a home or business.

Missouri's asset poverty rate is 21.6%.[40]

Children and Family & Economic Security



Economic opportunity usually means, that with hard work, all children can do better than their parents. However, most Americans no longer believe this is true. In fact, only 64% of all Americans believe that opportunities for economic and social mobility are widely available. [41]

Studies are now showing that most children raised in low-income families will probably have very low incomes as adults, while children raised in high-income families can anticipate very high incomes as adults. [41]

4%

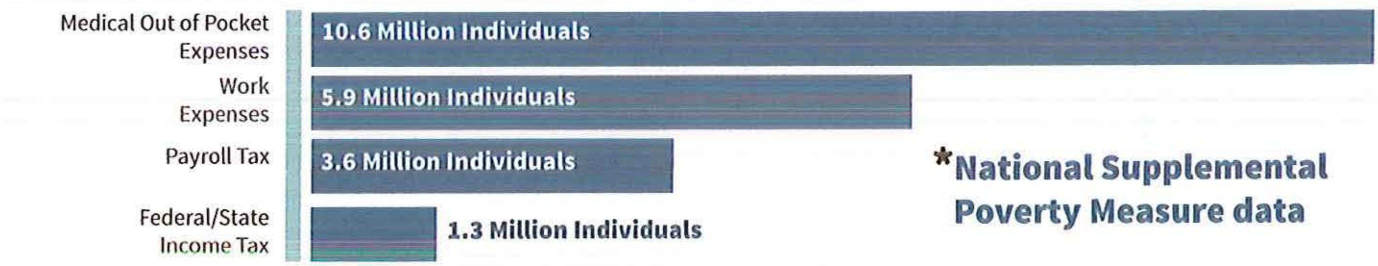
of children born to the poorest families become the highest earners[42]

43%

of children born to the poorest families remain poor into adulthood[42]

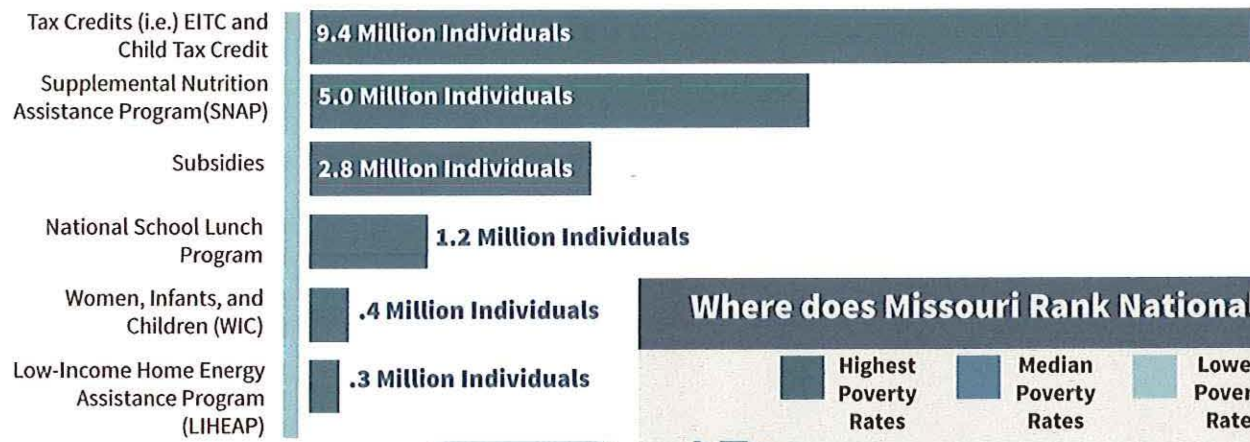
Additional Poverty Information

Factors Pushing People Into Poverty[3*]



***National Supplemental Poverty Measure data**

Factors Keeping People Out of Poverty[3*]



States with 3 Highest Poverty Rates:

1. Mississippi	21.5%
2. New Mexico	21.3%
3. Louisiana	19.8%

States with 3 Lowest Poverty Rates:

51. New Hampshire	9.2%
50. Maryland	10.1%
49. Connecticut	10.8%

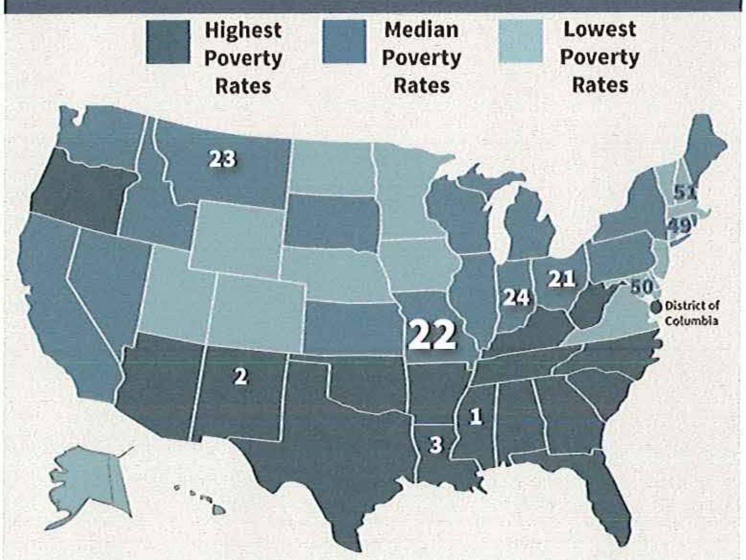
States Closest to Missouri's Poverty Rate of 15.5%

21. Ohio	15.8%
23. Montana	15.4%
24. Indiana	15.2%

To put this information into perspective...

Out of all 50 states and the District of Columbia, Missouri has the 22nd highest poverty rate.

Where does Missouri Rank Nationally?[46]



Missouri's Participation in Social Programs*

Individuals Receiving Temporary Assistance for Needy Families (TANF)[43]	70,596
Children Receiving Subsidized Child Care[43]	34,756
Children in Foster Care[43]	13,137

Individuals Enrolled in Missouri Health Net or CHIP[43]

Total	925,157
Elderly	77,508
Children	576,001
Disabled	160,676

Low Income Home Energy Assistance Program(LIHEAP)[30]	140,234
Households Receiving Federal Rental Assistance[44]	37,021
Children Enrolled in Head Start Programs[45]	17,527

*SNAP Utilization can be found on page 4


Missourians to End Poverty

Bringing the Community Together to End Poverty

food • health • education • housing & energy • economic & family security


Join the Missourians to End Poverty Coalition!

www.MoEndPoverty.org

Attachment B

MISSOURI

THE HOME ENERGY AFFORDABILITY GAP 2016

(2ND SERIES) PUBLISHED APRIL 2017

Finding #1

Poverty Level	Home Energy Burden
Below 50%	27%
50 – 100%	15%
100 – 125%	10%
125 – 150%	8%
150 – 185%	7%
185% - 200%	6%

Home energy is a crippling financial burden for low-income Missouri households. Missouri households with incomes of below 50% of the Federal Poverty Level pay 27% of their annual income simply for their home energy bills.

Home energy unaffordability, however, is not only the province of the very poor. Bills for households with incomes between 150% and 185% of Poverty take up 7% of income. Missouri households with incomes between 185% and 200% of the Federal Poverty Level have energy bills equal to 6% of income.

Finding #2

Poverty Level	Number of Households	
	Last Year	This Year
Below 50%	162,739	163,841
50 – 100%	209,020	208,891
100 – 125%	114,178	113,653
125 – 150%	119,599	116,126
150 – 185%	166,924	164,361
185% - 200%	68,634	68,492
Total < 200%	841,094	835,364

The number of households facing unaffordable home energy burdens is staggering. According to the most recent five-year American Community Survey, nearly 164,000 Missouri households live with income at or below 50% of the Federal Poverty Level and face a home energy burden of 27%. And nearly 209,000 *additional* Missouri households live with incomes between 50% and 100% of the Federal Poverty Level and face a home energy burden of 15%.

In 2016 the total number of Missouri households below 200% of the Federal Poverty Level stayed relatively constant from the prior year.

©2017 FISHER, SHEEHAN & COLTON | PUBLIC FINANCE AND GENERAL ECONOMICS | BELMONT, MASSACHUSETTS

Finding #3

Home Energy Affordability Gap: 2011 (base year)	$665,722,385
Home Energy Affordability Gap: 2016 (current year)	$660,903,195
Home Energy Affordability Gap Index (2011 = 100)	99.3

The Home Energy Affordability Gap Index (2nd Series) indicates the extent to which the Home Energy Affordability Gap has increased between the base year and the current year. In Missouri, this Index was 99.3 for 2016.

The Home Energy Affordability Gap Index (2nd Series) uses the year 2011 as its base year. The Index for 2011 is set equal to 100. A current year Index of more than 100 thus indicates that the Home Energy Affordability Gap for has increased since 2011. A current year Index of less than 100 indicates that the Home Energy Affordability Gap has decreased since 2011.

Finding #4

	Last Year	This Year
Gross LIHEAP Allocation ($000's)	$72,998	$65,662
Number of Households <150% FPL	605,536	602,511
Heating/Cooling Bills "Covered" by LIHEAP	92,403	101,018

Existing sources of energy assistance do not adequately address the Home Energy Affordability Gap in Missouri. LIHEAP is the federal fuel assistance program designed to help pay low-income heating and cooling bills. The gross LIHEAP allocation to Missouri was $65.7 million in 2016 and the number of average annual low-income heating and cooling bills "covered" by LIHEAP was 101,018.

In comparison, the gross LIHEAP allocation to Missouri in 2015 reached $73.0 million and covered 92,403 average annual bills.

Finding #5

Primary Heating Fuel	Penetration by Tenure	
	Owner	Renter
Electricity	28%	48%
Natural gas	55%	44%
Fuel Oil	0%	0%
Propane	11%	5%
All other	6%	3%
Total	100%	100%

The Home Energy Affordability Gap in Missouri is not solely a function of household incomes and fuel prices. It is also affected by the extent to which low-income households use each fuel. All other things equal, the Affordability Gap will be greater in areas where more households use more expensive fuels.

In 2016, the primary heating fuel for Missouri homeowners was Natural Gas (55% of homeowners). The primary heating fuel for Missouri renters was Electricity (48% of renters).

Changes in the prices of home energy fuels over time are presented in Finding #6 below.

Finding #6

Fuel	2014 Price	2015 Price	2016 Price
Natural gas heating (ccf)	$0.853	$0.868	$0.853
Electric heating (kWh)	$0.112	$0.116	$0.097
Propane heating (gallon)	$3.952	$2.590	$1.466
Fuel Oil heating (gallon)	$4.457	$3.057	$1.802
Electric cooling (kWh)	$0.122	$0.115	$0.108

In Missouri, natural gas prices stayed relatively constant during the 2015/2016 winter heating season. Fuel oil prices fell substantially 41.1% and propane prices fell 43.4%.

Heating season electric prices fell substantially 16.4% in the same period and cooling season electric prices fell 6.1%.

Home Energy Affordability Gap Dashboard -- Missouri 2016 versus 2015

AVERAGE DOLLAR AMOUNT BY WHICH ACTUAL HOME ENERGY BILLS EXCEEDED AFFORDABLE HOME ENERGY BILLS FOR HOUSEHOLDS BELOW 200% OF POVERTY LEVEL.

2015: $949 per household

2016: $791 PER HOUSEHOLD

AVERAGE TOTAL HOME ENERGY BURDEN FOR HOUSEHOLDS BELOW 50% OF POVERTY LEVEL.

2015: 29% of household income

2016: 27% OF HOUSEHOLD INCOME

PERCENT OF INDIVIDUALS BELOW 100% OF POVERTY LEVEL.

2015: 16% of all individuals

2016: 16% OF ALL INDIVIDUALS

NUMBER OF AVERAGE LOW-INCOME HEATING/COOLING BILLS COVERED BY FEDERAL HOME ENERGY ASSISTANCE.

2015: 92,403 bills covered

2016: 101,018 BILLS COVERED

PRIMARY HEATING FUEL (2016):

HOMEOWNERS - NATURAL GAS *** TENANTS - ELECTRICITY

©2017 Fisher, Sheehan & Colton | Public Finance and General Economics | Belmont, Massachusetts

NOTES AND EXPLANATIONS

The 2012 Home Energy Affordability Gap, published in May 2013, introduced the 2nd Series of the annual Affordability Gap analysis. The 2012 Home Energy Affordability Gap going forward cannot be directly compared to the Affordability Gap (1st Series) for 2011 and earlier years. While remaining fundamentally the same, several improvements have been introduced in both data and methodology in the Affordability Gap (2nd Series).

The most fundamental change in the Home Energy Affordability Gap (2nd Series) is the move to a use of the American Community Survey (ACS) (5-year data) as the source of foundational demographic data. The Affordability Gap (1st Series) relied on the 2000 Census as its source of demographic data. The ACS (5-year data) offers several advantages compared to the Decennial Census. While year-to-year changes are smoothed out through use of 5-year averages, the ACS nonetheless is updated on an annual basis. As a result, numerous demographic inputs into the Affordability Gap (2nd Series) will reflect year-to-year changes on a county-by-county basis, including:

- The distribution of heating fuels by tenure;
- The average household size by tenure;
- The number of rooms per housing unit by tenure;
- The distribution of owner/renter status;
- The distribution of household size;
- The distribution of households by ratio of income to Poverty Level;

Data on housing unit size (both heated square feet and cooled square feet) is no longer calculated based on the number of rooms. Instead, Energy Information Administration/Department of Energy (EIA/DOE) data on square feet of heated and cooled living space per household member is used beginning with the Home Energy Affordability Gap (2nd Series). A distinction is now made between heated living space and cooled living space, rather than using total living space.

The change resulting in perhaps the greatest dollar difference in the aggregate and average Affordability Gap for each state is a change in the treatment of income for households with income at or below 50% of the Federal Poverty Level. In recent years, it has become more evident that income for households with income below 50% of Poverty Level is not normally distributed. Rather than using the mid-point of the Poverty range (i.e., 25% of Poverty Level) to determine income for these households, income is set somewhat higher (40% of Poverty). By setting income higher, both the average and aggregate Affordability Gap results not only for that Poverty range, but also for the state as a whole, will be lower. The Affordability Gap results for other Poverty ranges remain unaffected by this change.

Another change affecting both the aggregate and average Affordability Gap is a change in the definition of "low-income." The Home Energy Affordability Gap (2nd Series) has increased the definition of "low-income" to 200% of the Federal Poverty Level (up from 185% of Poverty). While this change may increase the aggregate Affordability Gap, it is likely to decrease the average Affordability Gap. Since more households are added to the analysis, the aggregate is likely to increase, but since the contribution of each additional household is less than the contributions of households with lower incomes, the overall average will most likely decrease.

Most of the Home Energy Affordability Gap calculation remains the same. All references to "states" include the District of Columbia as a "state." Low-income home energy bills are calculated in a two-step process: First, low-income energy consumption is calculated for the following end-uses: (1) space heating; (2) space cooling; (3) domestic hot water; and (4) electric appliances (including lighting and refrigeration). All space cooling and appliance consumption is assumed to involve only electricity. Second, usage is multiplied by a price per unit of energy by fuel type and end use by time of year. The price of electricity, for example, used for space cooling (cooling months), space heating (heating months), and appliances (total year) differs to account for the time of year in which the consumption is incurred.

Each state's Home Energy Affordability Gap is calculated on a county-by-county basis. Once total energy bills are determined for each county, each county is weighted by the percentage of persons at or below 200% of the Federal Poverty Level to the total statewide population at or below 200% of the Federal Poverty Level to derive a statewide result. Bills are calculated by end-use and summed before county weighting.

LIHEAP comparisons use gross allotments from annual baseline LIHEAP appropriations as reported by the federal LIHEAP office. They do not reflect supplemental appropriations or the release of LIHEAP "emergency" funds. The number of average heating/cooling bills covered by each state's LIHEAP allocation is determined by dividing the total base LIHEAP allocation for each state by the average heating/cooling bill in that state, the calculation of which is explained below. No dollars are set aside for administration; nor are Tribal set-asides considered.

State financial resources and utility-specific rate discounts are not considered in the calculation of the Affordability Gap. Rather, such funding should be considered available to fill the Affordability Gap. While the effect in any given state may perhaps seem to be the same, experience shows there to be an insufficiently authoritative source of state-by-state data, comprehensively updated on an annual basis, to be used as an input into the annual Affordability Gap calculation.

Energy bills are a function of the following primary factors:

- Tenure of household (owner/renter)
- Housing unit size (by tenure)
- Heating Degree Days (HDDs) and Cooling Degree Days (CDDs)
- Housing size (by tenure)
- Heating fuel mix (by tenure)
- Energy use intensities (by fuel and end use)

Bills are estimated using the U.S. Department of Energy's "energy intensities" most-recently published in the DOE's Residential Energy Consumption Survey (RECS). The energy intensities used for each state are those published for the Census Division in which the state is located. Heating Degree Days (HDDs) and Cooling Degree Days (CDDs) are obtained from the National Weather Service's Climate Prediction Center on a county-by-county basis for the entire country.

End-use consumption by fuel is multiplied by fuel-specific price data to derive annual bills. State price data for each end-use is obtained from the Energy Information Administration's (EIA) fuel-specific price reports (e.g., Natural Gas Monthly, Electric Power Monthly). State-specific data on fuel oil and kerosene is not available for all states. For those states in which these bulk fuels have insufficient penetration for state-specific prices to be published, prices from the Petroleum Administration for Defense Districts (PADD) of which the state is a part are used.

The Home Energy Affordability Gap Index (2nd Series) uses 2011 as its base year. The base year (2011) Index has been set equal to 100. A current year Index of more than 100 thus indicates that the Home Energy Affordability Gap has increased since 2011. A current year Index of less than 100 indicates that the Affordability Gap has decreased since 2011. The Affordability Gap Index was, in other words, re-set in 2011. The Affordability Gap Index (2nd Series) for 2012 and beyond cannot be compared to the Affordability Gap Index (1st Series) for 2011 and before.

The Home Energy Affordability Gap is a function of many variables, annual changes in which are now tracked for nearly all of them. For example, all other things equal: increases in income would result in decreases in the Affordability Gap; increases in relative penetrations of high-cost fuels would result in an increase in the Gap; increases in amount of heated or cooled square feet of living space would result in an increase in the Gap. Not all variables will result in a change in the Affordability Gap in the same direction. The annual Affordability Gap Index allows the reader to determine the net cumulative impact of these variables, but not the impact of individual variables.

Since the Affordability Gap is calculated assuming normal Heating Degree Days (HDDs) and Cooling Degree Days (CDDs), annual changes in weather do not have an impact on the Affordability Gap or on the Affordability Gap Index.

Price data for the various fuels underlying the calculation of the Home Energy Affordability Gap (2nd Series) was used from the following time periods:

Heating prices	
Natural gas	February 2016
Fuel oil ***	Week of 02/08/2016
Liquefied petroleum gas (LPG) ***	Week of 02/08/2016
Electricity	February 2016
Cooling prices	August 2016
Non-heating prices	
Natural gas	May 2016
Fuel oil ***	Week of 10/03/2016
Liquefied petroleum gas (LPG) ***	Week of 10/03/2016
Electricity	May 2016

*****Monthly bulk fuel prices are no longer published. Weekly bulk fuel prices are published during the heating months (October through March). The prices used are taken from the weeks most reflective of the end-uses to which they are to be applied. Prices from the middle of February best reflect heating season prices. Bulk fuel prices from October best reflect non-heating season prices.**

BEFORE THE PUBLIC SERVICE COMMISSION OF THE STATE OF MISSOURI

In the Matter of Laclede Gas Company's Request to Increase Its Revenue for Gas Service.	))	**Case No. GR-2017-0215**
In the Matter of Laclede Gas Company d/b/a Missouri Gas Energy's Request to Increase Its Revenues for Gas Service.	)))	**Case No. GR-2017-0216**

AFFIDAVIT OF JACQUELINE A. HUTCHINSON

I, the undersigned, being duly sworn, states that my name is Jackie Hutchinson and that the foregoing Direct Testimony of Jackie A. Hutchinson, including attachments, was prepared by me on behalf of the Consumers Council of Missouri. This testimony was prepared in written form for the purpose of its introduction into evidence in the above utility rate cases at the Missouri Public Service Commission.

I hereby swear and affirm that the attached testimony is true and correct to my best knowledge, information, and belief, and I adopt said testimony as if it were given under oath in a formal hearing.

Jacqueline A Hutchinson

Jacqueline A. Hutchinson

Subscribed before me on this 8th day of September, 2017:

INDIVIDUAL ACKNOWLEDGMENT

State/Commonwealth of Missouri } ss.
County of City of St Louis

On this the 8 (Day) day of September (Month), 2017 (Year), before me, Micole Hughes (Name of Notary Public), the undersigned Notary Public, personally appeared Jacqueline A. Hutchinson (Name(s) of Signer(s)),

☒ personally known to me – **OR** –

☐ proved to me on the basis of satisfactory evidence

to be the person(s) whose name(s) is/are subscribed to the within instrument, and acknowledged to me that he/she/they executed the same for the purposes therein stated.

WITNESS my hand and official seal.

MICOLE HUGHES
Notary Public - Notary Seal
State of Missouri, Saint Louis City
Commission # 14974503
My Commission Expires May 17, 2018

Place Notary Seal/Stamp Above

Micole
Signature of Notary Public

Micole Hughes

Notary Public
Any Other Required Information
(Printed Name of Notary, Expiration Date, etc.)

INFORMATION IN AREAS 1-4 REQUIRED IN ARIZONA. OPTIONAL IN OTHER STATES.

Description of Any Attached Document

1 Title or Type of Document: ____________

2 Document Date: ____________ 3 Number of Pages: ____________

4 Signer(s) Other Than Named Above: ____________

OPTIONAL

RIGHT THUMBPRINT OF SIGNER #1	RIGHT THUMBPRINT OF SIGNER #2
Top of thumb here	Top of thumb here

© 2011 National Notary Association • NationalNotary.org • 1-800-US NOTARY (1-800-876-6827) Item #25936