How Much Is Enough: Family Budgets in Nevada

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Introduction

The poverty threshold, which was adopted by the Census Bureau in 1969, is the current official measurement of poverty. People with incomes below the poverty threshold for their family type (based on family size and number of children in the family) are considered “poor.” They are eligible for assistance.

However, there are several severe problems with the poverty threshold measure, including the overestimated portion of food expenses, ignorance of geographical differences, taxes, and childcare expenses. Therefore, policymakers and the public need a more accurate measurement of poverty. The family budgets calculation approach, by Economic Policy Institute (EPI), fixes most problems that the official measurement has.

The Poverty Thresholds

The original poverty thresholds were developed in the early 1960s by Molly Orshansky, an employee of the Social Security Administration. She based her thresholds on the U.S. Department of Agriculture’s (USDA) Economy Food Plan (predecessor of the Thrifty Food Plan), which she used to determine how much a family needed to spend on food to meet their minimum food needs. Orshansky then determined the share of income a family spent on food. In 1955, families of three or more persons (all such families, not just low-income families) spent about one-third of their after-tax money income on food. Because food costs were a third of a family’s expenses, Orshansky multiplied the cost of the food plan for different family sizes by three.

The Census Bureau updates the poverty thresholds for inflation each year using the consumer price index. Except for inflation adjustment, there have been only small changes to the poverty threshold calculation approach since the Census Bureau adopted it.

Problems with the Poverty Threshold

First, as discussed above, the methodology of poverty thresholds assumes that a family spends one-third of its income on food. This was a good estimate during the 1950s, but the family consumption structure has changed dramatically since then. Today, people spend more on housing, healthcare, and transportation, which leads to a lower relative spending on food in family consumption.


Second, the poverty threshold methodology ignores geographical differences across the nation. Most researchers agree, however, that there should be adjustments on different living costs across the U.S., and between urban and rural areas.\(^3\)

Third, the poverty thresholds exclude taxes. After-tax income often determines whether a family can make ends meet. Besides, many low-income families receive the Earned Income Tax Credit, which offsets other tax payments.

Fourth, the poverty thresholds do not account for differences in childcare and healthcare costs. The methodology that the Census Bureau adopted does not account for widely varying expenses for childcare and medical care. For instance, if a family has children and all the adults are at work, this family will have childcare expenses that other families without children will not have.

**Basic Ideas of Family Budgets**

The official poverty measure is unrealistic because it does not take into account the increased share of family income spending on housing and childcare. Family budgets yield estimates for every major budget item, including housing, childcare, healthcare, food, transportation, and taxes.

Many items in family budgets are geographically specific. For some budget items, such as food, there is no reliable data source for local costs. But for the items that vary the most by region, such as housing and childcare, the use of locally specific data in family budgets more accurately reflects costs faced by families. As a result, the family budget approach is a better estimate of the poverty measure.

By including taxes paid, family budgets more realistically reflect the money families spend on basic needs. These budgets can also better determine the effects of work supports (for instance, childcare subsidies) on a family’s ability to meet its basic needs.

Most poverty measures are viewed as measures of the threshold level of deprivation, or the minimum needed for survival. Family budgets set a higher standard; these budgets seek to show the income a family needs for a safe and decent standard of living. But, most family budget calculations use conservative assumptions, by not including items such as restaurant meals, vacations, movies, or savings for education or retirement.

**Calculation of Nevada Family Budget**

According to the Census Bureau about 88 percent of Nevada’s population lives in the Las Vegas-Paradise and Reno-Sparks Metropolitan Statistical Area (MSA). These cities are selected to estimate the basic Nevadan family budget.

The following paragraphs discuss the estimates in the costs of housing, food, childcare, transportation, healthcare, and tax, based on a two-adult, two-child family type. Monthly costs for Las Vegas-Paradise and Reno-Sparks are shown in Figure 1 on page 4.

- **Housing**
  
  The average monthly rental rate of an unfurnished 2-bedroom/1-bathroom apartment is $787 in Las Vegas.\(^4\) And, the average monthly rental rate of a 2-bedroom apartment is $943 in Reno-Sparks MSA.\(^5\)

- **Food**

  Estimates of food expenses rely on the U.S.

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Department of Agriculture’s (USDA) Low-Cost Food Plan in February 2008. The basis of this plan is that all meals and snacks are purchased at stores and prepared at home. A two-adult, two-child family is estimated to spend $628.50 a month for a low-cost plan.

- **Childcare**
  According to the *Child Care and Development Fund Fact Sheet*, the average monthly cost of care for each child was $369 in January 2008 in Nevada. So, for a two-adult, two-child family, the cost is $738 a month.

- **Transportation**
  The estimated costs of transportation rely on data from the Census Bureau, the National Transportation Survey, and the Bureau of Transportation Statistics.

Table 1 shows the corresponding relationship between the MSA population and the annual driving mileage. The January 2006 population was 1,777,539 in Las Vegas-Paradise MSA, and 400,560 in Reno-Sparks MSA. Besides, the average cost per mile is estimated to be $0.56 in 2004.

According to the formula given by the EPI, the annual transportation cost for a two-adult, two-child family in Las Vegas is: $0.69 (nonsocial trips 1st adult) * 9,121 * $0.56 + 0.28 (work trips 2nd adult) * 9,121 * $0.56 = $4,954.53. By the same methodology, the estimated cost in Reno is $4,305.95.

- **Healthcare**
  The estimated healthcare costs rely on data from insurance quote provider (www.ehealthinsurance.com). By inputting zip code and family member information, the Web site will list the quotes for various health-insurance policies available in Las Vegas and Reno. Again for a two-adult, two-child family, the cheapest insurance costs $263 a month in Las Vegas, and $244.01 in Reno.

- **Other Necessities**
  The estimated costs of necessities rely on data from the Consumer Expenditure Survey on the share of a family’s budget spent on items such as telephone, apparel, personal items, and other necessities. According to EPI, the annual costs for other necessities equal 31 percent of annual housing costs and annual food costs combined. Therefore, the monthly other necessities costs in Las Vegas are 0.31 * ($787 + $628.5) = $438.81. In Reno, the costs are 0.31 * ($943 + $628.5) = $487.17.

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7 19-50 years old for the couple, and 2-3 and 4-5 years old for each child.
8 The fact sheet is published monthly by the Nevada Department of Health and Human Services - Division of Welfare and Supportive Services, http://dwss.nv.gov/index.php?option=com_docman&task=cat_view&gid=40&Itemid=287.
9 Population Division, U.S. Census Bureau.
11 The price of gasoline went up dramatically after 2004, however, there are no cost-per-mile data available for years after 2004.

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<table>
<thead>
<tr>
<th>MSA Population Size</th>
<th>Average Annual Miles Driven</th>
</tr>
</thead>
<tbody>
<tr>
<td>Less than 250,000</td>
<td>8,437</td>
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<tr>
<td>250,000 to 499,999</td>
<td>7,927</td>
</tr>
<tr>
<td>500,000 to 999,999</td>
<td>8,612</td>
</tr>
<tr>
<td>1,000,000 to 2,999,999</td>
<td>9,121</td>
</tr>
<tr>
<td>3,000,000 and more</td>
<td>8,402</td>
</tr>
<tr>
<td>Non MSA</td>
<td>10,541</td>
</tr>
</tbody>
</table>


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12 Offered by Sierra Health and Insurance Company, Inc.
13 Offered by Humana Inc.
• **After-Tax Annual Family Budget**
To get the after-tax annual total costs, the monthly costs were transformed to annual costs by multiplying the monthly costs by 12. Then all the above-mentioned items are added together. In Las Vegas, the after-tax annual total costs are $39,218.25, and in Reno the costs are $40,794.11.

• **Taxes**
The payroll taxes are assumed to be 7.65% of an after-tax annual family budget. So, the payroll taxes in Las Vegas are $3,000.20, and in Reno the payroll taxes are $3,120.75. Then the taxable gross income in Las Vegas would be $3,9218.25 – $3,000.20 = $36,218.05, and in Reno it would be $37,673.36.

Nevada does not have a state income tax, therefore, all the taxable gross income is only subject to the federal income tax. Besides income tax, the property taxes are already included in the cost of rent, and sales taxes are already included in the other necessities costs. The federal income tax rate is 15 percent,\textsuperscript{14} so the taxes in Las Vegas would be 0.15 * $36,218.05 = $5,432.71, and in Reno would be 0.15 * $37,673.36 = $5,651.00.

• **Pretax Annual Total Budget**
The pretax annual total (family budget) is calculated by adding taxes to the after-tax annual total. The total family budget in Las Vegas is $44,650.96, and in Reno it is $46,445.11. By contrast, the 2007 poverty threshold is $21,027 for a two-adult, two-child family.\textsuperscript{15}

\textsuperscript{14} For people married filing jointly with total taxable income between $16,050 - $65,100.

\textsuperscript{15} The Census Bureau, \url{http://www.census.gov/hhes/www/poverty/threshld/thresh07.html}.

\begin{figure}[h]
\centering
\includegraphics[width=\textwidth]{figure1.png}
\caption{Monthly Costs in Different Categories}
\end{figure}
Implications for Public Policy

• Childcare Subsidies. As shown in Figure 1, childcare is the second-highest cost for a family, which comprises more than one-fifth of the family budget. One study estimated that in 1996, two-thirds of low-income, two-adult families who paid for childcare spent 30 percent or more of their income on childcare expenses. For families headed by single working parents, that amount climbed to 40 percent. Therefore, it is crucial to continue childcare subsidies and assess whether more funding is needed.

• Welfare Reform. The foremost goal of welfare reform is for single-mother families to reduce their dependence on government and increase their self-reliance through paid jobs. It is important to assess how many jobs are available in low-income labor markets that pay enough for families—especially single-parent families—to support themselves above the income level set by family budgets.

• Information for Low-Income Families. Children from low-income families are more likely to be undernourished and not covered by health insurance. Research suggests that low-income families have been less likely to use supportive programs for which they are eligible during the last several years than before. It is important to inform the low-income families about the eligibility and application procedures for food stamps and Medicaid, which help in increasing their incomes indirectly.

Conclusion

Based on the family budgets calculation approach, we estimate the family budgets for a two-adult, two-child family in the Las Vegas-Paradise and Reno-Sparks areas. Our estimates are $44,650.96 and $46,445.11, respectively. By contrast, the 2007 official poverty threshold is $21,027 for a two-adult, two-child family.

Recently, the prices of food and gasoline have been increasing sharply, which will affect our estimates for food and transportation expenses. In order to obtain more accurate estimates of family budgets in future research, the most recent data are required.

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References


Nevada Department of Health and Human Services, Division of Welfare and Supportive Services, “Child Care and Development Fund Fact Sheet.”


U.S. Census Bureau, Population Division, Annual Estimates of the Population of Metropolitan and Micropolitan Statistical Areas.
