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 **RESEARCH THAT MATTERS** 

# **LGBT POVERTY IN** THE UNITED STATES

A study of differences between sexual orientation and gender identity groups

October 2019

M. V. Lee Badgett Soon Kyu Choi Bianca D.M. Wilson

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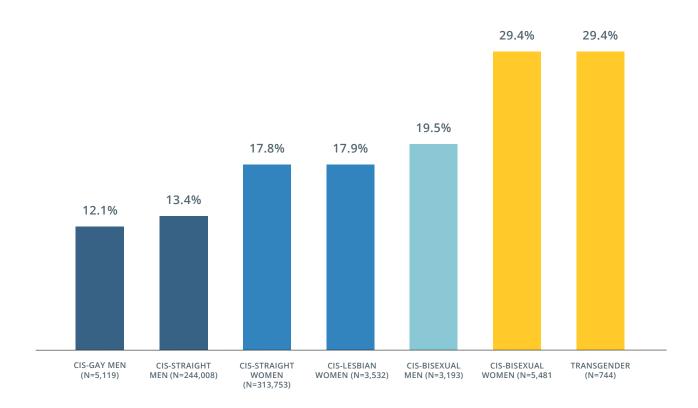
### **EXECUTIVE SUMMARY**

Although prior research has documented rates of poverty among lesbian, gay, bisexual, and transgender (LGBT) people and shown evidence of economic disparities for LGBT people, most studies on the topic have not been able to fully describe the entire LGBT community across the United States. Many past studies used data that do not allow for identification of transgender people or people not living in same-sex couples. This study, which is the first in a series of reports based on the Pathways to Justice Project, addresses earlier shortcomings of the research on poverty to provide a new lens on one of the most important measures of economic security—living on very low incomes. In particular, this new research on LGBT poverty comes from the Behavioral Risk Factor Surveillance System (BRFSS) survey, which has asked questions about sexual orientation and gender identity (SOGI) since 2014. This report covers self-identified lesbians, gay men, bisexual people, and transgender people (of various sexual orientations) in 35 states from 2014 to 2017. The focus of the full report is answering the following questions about LGBT poverty:

- 1. Do poverty rates differ by SOGI? How do these differences look across various demographic characteristics?
- 2. Do LGBT and cisgender (cis) straight people differ in ways that affect poverty?
- 3. Accounting for other known factors related to poverty, do LGBT people still experience higher rates of poverty compared to cisgender straight people?

#### MAIN FINDINGS

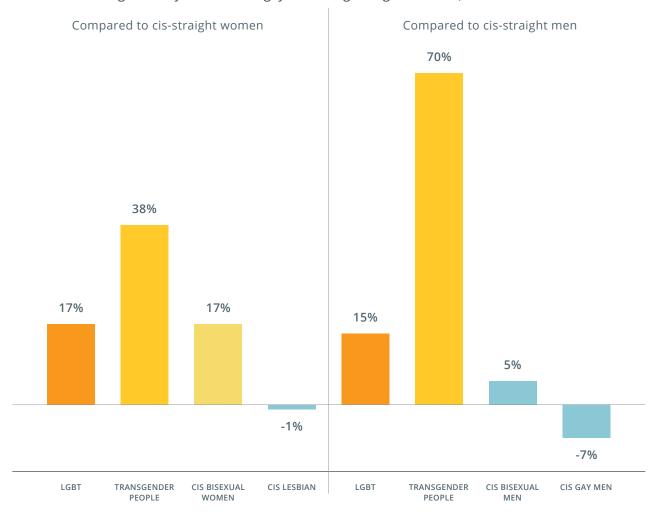
- Poverty rates differ by SOGI. We examined poverty rates separately for cisgender straight men and women, cisgender gay men and lesbian women, cisgender bisexual men and women, and transgender people.
  - LGBT people collectively have a poverty rate of 21.6%, which is much higher than the rate for cisgender straight people of 15.7%.
  - Among LGBT people, transgender people have especially high rates of poverty—29.4%.
  - Lesbian (17.9%) and straight (17.8%) cisgender women have higher poverty rates than gay (12.1%) and straight (13.4%) cisgender men. But cisgender lesbian women do not have significantly different poverty rates than cisgender straight women.
  - O Bisexual cisgender women (29.4%) and men (19.5%) had higher poverty rates than cisgender straight women and men, respectively.



Poverty was also particularly high at the intersection of racial and SOGI minority statuses.

- Black, White, Asian, and other-race LGBT people have statistically significant higher poverty rates than their same-race cisgender straight counterparts. For example, 30.8% of Black LGBT people live in poverty, whereas 25.3% of Black cisgender straight people live in poverty.
- The patterns of racial disparities in poverty rates were similar for both LGBT and cisgender straight people. That is, for nearly all SOGI groups, people of color had significantly higher poverty rates than White people.
- LGBT people in rural areas (26.1%) have the highest poverty rates, compared to LGBT people in urban areas (21.0%) and cisgender straight people in either rural (15.9%) or urban (15.5%) areas.
- LGBT and cisgender straight people differ in ways that affect the likelihood of poverty.
  - Several characteristics known to be related to poverty are more common among LGBT people. LGBT people, particularly bisexual and transgender people, are more likely to be:
    - people of color,
    - young, and
    - experiencing a disability.
  - O However, some LGBT groups have higher levels of education, live in urban areas, and have fewer children (namely, gay cisgender men), all factors that protect them from poverty.
- Once factors such as race, age, location, education, disability, language marital status, employment, health, and children are taken into account, we find that LGBT people are still more likely to experience poverty than their cisgender straight counterparts.

- Beyond the poverty-related factors that are more common among LGBT people such as those previously listed, LGBT people as a group had higher odds of being poor than cisgender straight people—17% higher odds compared to cisgender straight women and 15% higher compared to cisgender straight men. The chart below shows these differences, but the bars in light blue show differences that are not statistically significant.
  - However, compared to cisgender straight women, bisexual cisgender women and transgender people drove this economic disparity. Lesbians were neither more nor less likely to be poor than cisgender straight women.
  - Once accounting for the effect of other factors, bisexual cisgender men no longer had significantly lower poverty rates compared to cisgender straight men, but transgender people remained more likely to experience poverty. Gay cisgender men were just as likely to be poor as cisgender straight men (the difference in likelihood was not significantly different for gay and straight cisgender men).



Taken together, this report extends our knowledge of LGBT poverty. Using a new dataset with more detailed measures of SOGI and a much larger sample size than previous studies reveals important differences in the collective group of LGBT people.

### INTRODUCTION

Over time, evidence has grown showing that lesbian, gay, bisexual, and transgender (LGBT) people face significant economic disparities compared with cisgender (cis) heterosexual<sup>a</sup> people. Poverty rates are at least as high for LGBT people as for the general population, and certain subgroups of the LGBT community are more likely to be poor than the general population, particularly bisexual people and transgender people.<sup>1-5</sup> Studies have shown that high proportions of LGBT adults face food insecurity. Young LGBT people have high rates of involvement in the foster care system, which is a predictor of future economic insecurity, 7-9 and they represent a disproportionately high proportion of young people experiencing homelessness in some cities 10-12 and incarceration. 13 In the LGBT community, people of color appear to be particularly vulnerable to poverty and other indicators of economic insecurity. 4,10,14

So far, however, research on economic insecurity has not been able to fully describe the low-income population of the LGBT community. Many past studies used data that do not allow for identification of transgender people or people not living in couples. Also, small samples of LGBT people make it difficult to investigate economic insecurity in individual states or rural areas. Further, although it is useful to examine how LGBT communities are faring as a whole, it is also important that we build on prior work to provide specific information that distinguishes economic outcomes among subgroups of the LGBT community.

This study expands on existing research to provide a new lens on one of the most important measures of economic security—poverty or living on very low incomes. It is the first report in a series completed as part of the Pathways to Justice Project, a multimethod long-term project examining poverty rates, exploring life narratives, and documenting experiences with economic development services among LGBT people.

This first report extends our knowledge of how sexual orientation and gender identity (SOGI) affect the likelihood that an individual will experience poverty using a national dataset, the Behavioral Risk Factor Surveillance System (BRFSS) survey. This report covers self-identified lesbians, gay men, and bisexual people (n = 20,926, 3.7% weighted in aggregate dataset) and transgender people (of various sexual orientations; n = 3,037, 0.5% weighted in aggregate dataset) in 35 states from 2014 to 2017. In addition, we provide estimates of LGBT poverty in rural and urban areas.

a We use "cisgender straight" or "cisgender heterosexual" interchangeably in this report and in tables for readability.

Throughout this report, we provide the key findings of analyses we conducted to answer major questions about LGBT poverty:

- 1. Do poverty rates differ by SOGI? How do these differences look across various demographic characteristics?
- 2. Do LGBT and cisgender straight people differ in ways that affect the risk of poverty?
- 3. Accounting for other known factors related to poverty, do LGBT people still experience a higher risk of poverty?

Our analysis accounted for the effects of age, race, urbanicity, language, and disability, as well as for the effects of education, marital status, employment status, and health on poverty. We selected these factors because they are linked to poverty, both as causes and effects. Testing whether SOGI are related to poverty beyond those characteristics sheds additional light on poverty dynamics.

Throughout the initial sections of the paper, we provide detailed information on LGBT people as a whole and the multiple subgroups represented. Details regarding the study methods and statistical analyses, such as what measures were used to define poverty and identify respondents' SOGI, are explained at the end of this report in an appendix. Box 1 provides an explanation of the standard definition of poverty in the United States, which compares a household's income to the poverty threshold defined by the federal government.

#### How We Define Poverty

In the United States, an individual is considered to be experiencing poverty if their family income falls below the official federal poverty threshold. The thresholds are set each year for different sizes of households. In 2015, for example, a family of two adults and one child would be considered living in poverty if their annual income fell below \$19,078. See the appendix for further details.

### **FINDINGS**

### POVERTY RATES DIFFER BY SEXUAL ORIENTATION AND GENDER **IDENTITY**

At a very general level, we can see that SOGI affects the likelihood that someone is poor, because more LGBT people (21.6%) than straight cisgender people (15.7%) are living in poverty (see Figure 1).

Figure 1. Poverty rates comparing LGBT and cisgender straight adults



In addition to assessing poverty rates between LGBT and non-LGBT people, a major aim of this study was to understand the differences in poverty among LGBT people. Figure 2 shows the poverty rates for seven different gendersexual orientation combinations. We see that cisgender straight (13.4%) and gay men (12.1%) have similar rates of poverty, and their poverty rates are lower than every other group. Cisgender lesbians (17.9%) have similar rates of poverty to cisgender straight women (17.8%), and both groups have significantly higher rates of poverty compared to cisgender gay and straight men. Compared to cisgender straight

and lesbian women, bisexual women and transgender people have higher poverty rates, at 29.4% for both groups. Similarly, compared to cisgender straight and gay men, transgender people and bisexual men have higher poverty rates, although bisexual men's rate is 19.5%, compared to 29.4% for all transgender people. This difference between bisexual men and transgender people is statistically significant.

For descriptive purposes, we provide poverty rates on gender subgroups of transgender people (see Table 1). Those who identified as transgender men have the highest poverty rate (33.7%), followed by transgender women (29.6%) and gender nonconforming people (23.8%); however, these differences are not statistically significant. Because a transgender gender experience has been shown to be a unique and significant factor in economic, health, and experienced discrimination, 15-17 we compared transgender people as one group to the other gender and sexual orientation subgroups in Figure 2 and in all other analyses in this report. We made this decision because the sample size of transgender people is relatively small, making comparisons difficult if we were to divide transgender people into their different gender identities, and it avoids untested assumptions about whether experiences related to economic insecurity compared to cisgender men and women need to be framed in terms of sex assigned at birth or current gender identity.

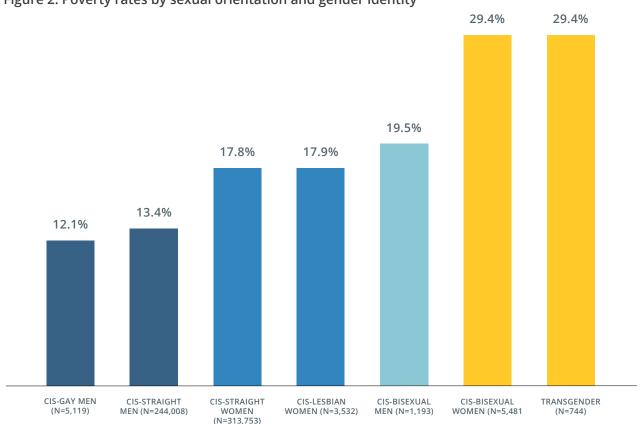


Figure 2. Poverty rates by sexual orientation and gender identity<sup>b</sup>

Table 1. Poverty rates in the transgender population

TRANSGENDER PEOPLE	%	N
Transgender men	33.7	172
Transgender women	29.6	242
Gender nonconforming	23.8	109

In the following sections, we present the percentage of people who experience poverty by SOGI. We discuss whether the patterns are the same for people who live in urban versus rural areas, are of different races and ethnicities, and are of different ages.

### Geography and LGBT status

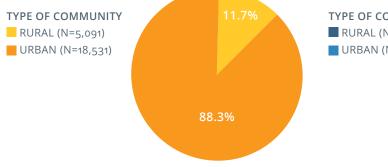
One major advantage of the BRFSS dataset is that it allows for a much more detailed analysis of poverty for LGBT people across geographic areas. In this section, we look first at the urban-rural divide and how LGBT people fare, followed by a presentation of poverty rates for the states that included a SOGI question module during the 2014–2017 period.

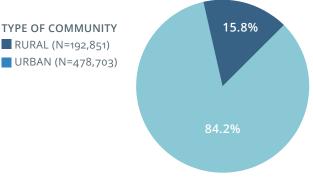
<sup>&</sup>lt;sup>b</sup> The sample size for cisgender straight men and cisgender straight women (n = 58,583) does not equal the sample size in Figure 1 for cisgender straight adults (n = 58,773) because 190 respondents did not provide information on their gender but did provide information on their sexual orientation or gender identity. For the same reason, the sum of the separate

Figure 3 shows the proportions of LGBT and cisgender straight people living in rural and urban areas. As Figure 3 shows, LGBT people are more likely to live in urban areas (88.3%) compared to their cisgender straight counterparts (84.2%); 11.7% of LGBT people live in rural areas, compared to 15.8% of cisgender straight people. In a more detailed analysis (not presented here), we found that difference to be significant and persistent after considering other characteristics such as education, employment, race, and age.c

Figure 3. Percentages of LGBT and cisgender straight people living in rural and urban areas

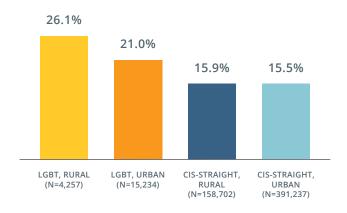
Percent of LGBT People Living in Urban and Rural Percent of Cisgender Straight People Living in Urban and Rural Communities Communities TYPE OF COMMUNITY TYPE OF COMMUNITY





Given this difference between urban and rural populations by SOGI status, we compared poverty rates of people living in urban areas to those living in rural areas in Figure 4 by SOGI. First, note that the poverty rates for LGBT people as a whole are higher than the rate among cisgender straight people in both urban and rural areas. About 16% of cisgender straight people live in poverty in both urban and rural areas, but one in five (21.0%) LGBT people live in poverty in urban areas and one in four (26.1%) in rural areas are poor. In other words, although both rural and urban LGBT people have higher rates of poverty, the gap is larger for LGBT people in rural areas.

Figure 4. Poverty rates comparing LGBT and cisgender straight people by rural and urban residence



As with the differences in poverty rates between SOGI groups previously noted, cisgender bisexual women and transgender people have the highest rates of poverty in both rural and urban areas, as shown in Table

LGBT groups (n = 3,221) in Figure 2 does not equal the LGBT (n = 3,222) sample in Figure 1.

<sup>&</sup>lt;sup>c</sup> We conducted a logistic regression with living in urban area as an outcome and SOGI as a predictor variable. We also included other variables such as race, education, age, etc. to account for characteristics that may prompt someone to live in an urban area.

2. Their rates are higher than those of cisgender straight women and men in both urban and rural areas.

In urban areas, cis-gay men (11.9%) and cis-straight men (13.4%) have similar rates of poverty, as do cis-lesbian women (17.5%) and cis-straight women (17.6%), though the differences between these men and women groups is statistically significant. Additionally, cisgender bisexual women in urban areas (28.3%) have a much higher rate of poverty than cisgender bisexual men (19.1%). Cisgender bisexual women and transgender people have the highest rate of poverty compared to all other groups in the urban areas.

In rural areas, SOGI patterns of poverty somewhat differ. Although the poverty rate of cisgender straight men (13.2%) and cisgender gay men (13.6%), and cisgender lesbian women (19.5%) and cisgender straight women (18.6%) remain similar, the differences by gender are no longer statistically significant with the exception of cisgender straight men and women. Cisgender bisexual women in rural areas (37.0%) continue to have a higher rate of poverty than cisgender bisexual men (24.5%), but that difference is not statistically significant. However, cisgender bisexual women in rural areas have the highest rate of poverty compared to all other groups and a much higher rate of poverty than cisgender bisexual women in urban areas. Transgender people in rural areas (27.6%) also have a high rate of poverty, but they are not statistically significantly different than cisgender lesbian women or cisgender bisexual men in rural areas or transgender people in urban areas.

Table 2. Poverty rates by SOGI and rural and urban residence

	URBAN		RURAL		
SOGI					
Cis-straight men	13.4	14,891	13.2	6,524	
Cis-straight women	17.6	24,776	18.6	11,675	
Cis-gay men	11.9	386	13.6	348	
Cis-lesbian women	17.5	331	19.5	103	
Cis-bisexual men	19.1	98	24.5	121	
Cis-bisexual women	28.3	928	37.0	344	
Transgender	29.5	358	27.6	158	

Note: Bold percentages indicate respondents differed significantly (p < .05) by row. For example, 28.3% of cis-bisexual women in urban areas experienced poverty compared to 37.0% of cis-bisexual women in rural areas. This difference is statistically significant and indicated by the bold percentages. However, the difference between cis-straight men in urban areas (13.4%) compared to cis-straight men in rural areas (13.2%) is not statistically significantly different and, therefore, not bold.

For another geographic perspective, we examined how poverty rates varied for SOGI groups across states. Thirty-five states included the SOGI module at least once in the 2014-2017 BRFSS surveys, allowing us to explore poverty rates by SOGI in these 35 states. Table 3 shows that LGBT people have significantly higher poverty rates in 22 of the states: Connecticut, Hawaii, Idaho, Illinois, Indiana, Iowa, Kansas, Kentucky, Louisiana, Maryland, Minnesota, Montana, New York, Ohio, Oklahoma, Pennsylvania, Rhode Island, Texas, Virginia, Vermont, Washington, and Wisconsin. The difference in poverty rates was not statistically significant in the remaining 13 states: California, Colorado, Delaware, Florida, Georgia, Massachusetts, Mississippi, Missouri, Nevada, North Carolina, South Carolina, West Virginia, and Wyoming. In 12 of the 13 states (the exception being Florida), the poverty rates were higher for LGBT people but not statistically significantly higher.

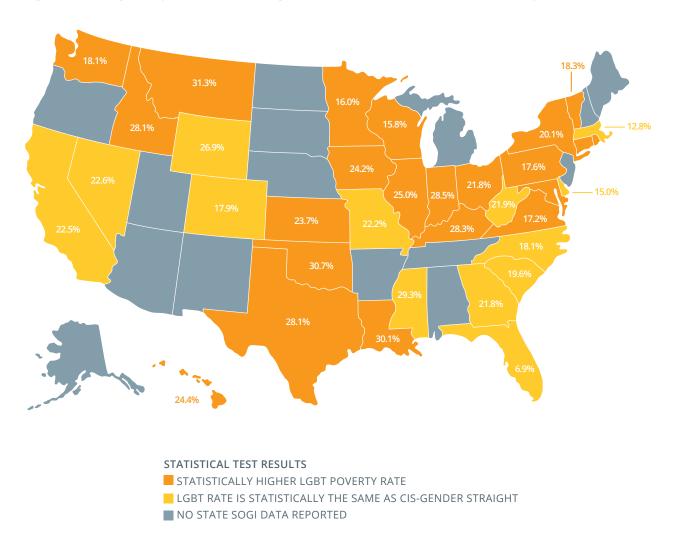
Table 3. Poverty rates of states that included the SOGI module comparing LGBT and cisgender straight people

	POVERTY RAT	E		
	CIS-STRAIGH		LGBT	
STATES THAT INCLUDED THE SOGI MODULE				
California	22.8	2,945	22.5	147
Colorado	11	808	17.9	41
Connecticut	10.1	1,637	17.8	97
Delaware	13	1,103	15	53
Florida	10.8	570	6.9	19
Georgia	18.4	1,050	21.8	51
Hawaii	16.7	3,318	24.4	212
Idaho	13.5	1,383	28.1	66
Illinois	14.1	1,233	25	83
Indiana	15.1	3,334	28.5	203
Iowa	10.5	1,404	24.2	75
Kansas	11.9	2,197	23.7	119
Kentucky	17.7	2,163	28.3	107
Louisiana	21.2	2,051	30.1	78
Massachusetts	9.4	1,160	12.8	92
Maryland	11.6	1,121	22.7	66
Minnesota	8.8	2,772	16	174
Mississippi	23.2	1,371	29.3	34
Missouri	13.3	1,114	22.2	44
Montana	14.7	1,248	31.3	58
Nevada	18.8	1,158	22.6	81
New York	16.3	5,162	20.2	359
North Carolina	16.5	460	18.1	25
Ohio	13.2	3,049	21.8	140
Oklahoma	17.2	559	30.7	28
Pennsylvania	12	2,136	17.6	112
Rhode Island	12.9	764	20.8	57
South Carolina	17.5	1,078	19.6	37
Texas	21.1	3,438	28.1	164
Vermont	9.8	1,147	18.3	87
Virginia	12.4	2,040	17.2	95
Washington	11.5	1,650	18.1	123
West Virginia	18.5	643	21.9	22
Wisconsin	8.5	1,230	15.8	60
Wyoming	8.7	277	26.9	13

Note: Bold percentages indicate respondents differed significantly (p < .05) by row. For example, 17.8% of LGBT people experienced poverty compared to 10.1% of cisgender straight people in Connecticut. This difference is statistically significant and indicated by the bold percentages. However, the difference between LGBT people (22.5%) and cisgender straight people (22.8%) in California is not statistically significantly different and, therefore, not bold.

Figure 5 maps the states and their LGBT poverty rates, with orange states denoting a significantly higher poverty rate for LGBT people compared to their cisgender straight counterparts. The geographic pattern generally shows higher poverty rates for LGBT people in Northeast, Midwest, Northwest, and Southwest states.





Overall, this section shows that where one lives matters for the poverty gap between LGBT people and cisgender straight people. Being in a rural area appears to be especially challenging to economic stability for LGBT people. States with poverty gaps appear in most regions of the United States, suggesting that some states and regions are also more economically challenging for LGBT people relative to cisgender straight people.

### Race, ethnicity, and LGBT status

When making comparisons between cisgender straight people and the combined LGBT respondents, we see that Black, White, Asian, and "other" LGBT people have statistically significantly higher poverty rates than their same-race cisgender straight counterparts (Table 4). For example, 30.8% of Black LGBT people live in poverty, whereas 25.3% of Black cis-straight people live in poverty. The LGBT

people in the remaining groups of people of color tend to have similarly high rates of poverty when compared to cisgender people of the same racial and ethnic groups.

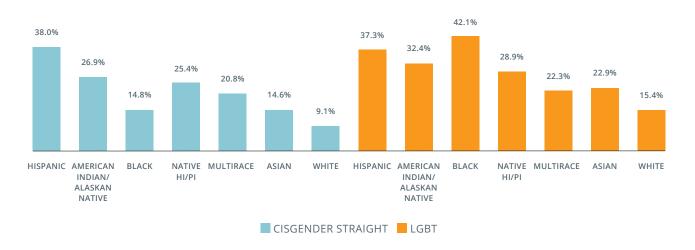
Table 4. Poverty rates comparing LGBT and cisgender straight people by race and ethnicity

	CIS-STRAIGHT		LGBT		
				N	
White	9.1	32,049	15.4	1,802	
Black	25.3	8,986	30.8	382	
Hispanic	38.0	10,362	37.3	520	
American Indian or Alaska Native	26.9	1,438	32.4	101	
Asian	14.6	1,819	22.9	102	
Native Hawaiian or Pacific Islander	25.4	437	28.9	33	
"Other" race	14.8	266	42.1	29	
Multirace	20.8	2509	22.3	186	

Note: Bold percentages indicate respondents differed significantly (p < .05) by row.

We can also look at the influence of race and ethnicity on poverty rates among cisgender straight people and LGBT people. Figure 6 shows that except for the "other race" category, the poverty rates follow similar patterns for both cisgender straight people and LGBT people, though LGBT people of all races and ethnicities show higher rates of poverty than their cisgender straight counterparts.

Figure 6. Poverty rates comparing LGBT and cisgender straight people by race and ethnicity



When we separate the LGBT population into subgroups (see each row in Table 5), the patterns of poverty rates among SOGI groups generally remain the same across racial groups, but the differences are not all statistically significant. In each racial and ethnic group, cisgender straight women have significantly higher poverty rates than cisgender straight men. But among LGB cisgender people, this gender disparity only holds true for Black lesbians (31.3%) and bisexual women (39.7%) when compared to Black gay (17.1%) and bisexual men (20.3%). In most racial and ethnic groups, transgender people had significantly higher poverty rates when compared to all cisgender straight people and to gay and bisexual cisgender men. For example, almost half (48.4%) of Hispanic

transgender people live in poverty, whereas 32.5% of Hispanic cisgender straight men live in poverty. This difference was not observed among Black respondents, for whom—despite the rates of poverty appearing similarly high among cisgender lesbians, bisexual women, and transgender people when compared to cisgender straight women—only bisexual cisgender women's poverty rates reached statistical significance. Transgender people and cisgender sexual minority women of color tended to have comparable poverty rates.

Table 5. Poverty rate by SOGI and race and ethnicity

SOGI	WHITE		BLACK		HISPANI	С	OTHER	
		N						
Cis-straight men	7.6	11,702	21.8	2,833	32.5	4,014	15.7	2,810
Cis-straight women	10.5	20,345	28.0	6,150	43.6	6,347	18.5	3,659
Cis-gay men	8.1	287	17.1	45	24.0	88	15.4	67
Cis-lesbian women	10.7	251	31.3	63	34.8	49	27.5	72
Cis-bisexual men	14.6	258	20.3	43	33.6	80	22.5	80
Cis-bisexual women	23.4	755	39.7	154	45.4	201	26.9	155
Transgender	18.6	250	38.5	77	48.4	102	35.2	77

Note: Ethnic and racial groups are collapsed for readability and sample sizes. See Supplemental Tables for all ethnic and racial groups.

Note: Bold percentages indicate respondents differed significantly (p < .05) by row when compared to White respondents (shaded column). For example, the poverty rate of Hispanic (33.6%) and "other race" (22.5%) cis-bisexual men are statistically significantly different from that of White cis-bisexual men (14.6%). However, poverty rates of Black cis-bisexual men (20.3%) are not statistically different from that of White cis-bisexual men.

Another way to look at the influence of race and ethnicity is to note that in general, the poverty rates for White people are lower than for people of color—only 7.6% of White cisgender straight men are poor, compared with 21.8% of Black and 32.5% of Hispanic cisgender straight men. For nearly all SOGI groups, people of color had significantly higher poverty rates than White people. The few exceptions to this rule were that cisgender bisexual women categorized as "other" in terms of race (meaning a combination of those who selected Asian or Pacific Islander, American Indian, other, and multiracial) did not have statistically different poverty rates than their White counterparts, and bisexual Black and White cisgender men did not differ significantly.

### **AGE AND LGBT STATUS**

Regarding age group differences, Table 6 presents poverty rates by age group for cisgender straight and LGBT people. Overall, there are some similarities in age patterns for LGBT people and cisgender straight people, with poverty rates highest in the youngest groups but declining in older age groups. Looking in each age group in Table 6, though, we see that poverty rates tend to be higher for LGBT people, but those differences are only statistically significant for people aged 18 to 44 years old. For older groups, the differences between poverty rates for LGBT people and cisgender straight people are not significantly different.

549 433

258

15.8

13.5

9.8

	CISGENDER	STRAIGHT	LGBT	
18-24	26.9	5,571	30.7	661
25-34	21.8	9,080	24.7	801
35-44	18.5	9,649	24.8	513

10,900

12,537

10,782

Table 6. Poverty rates comparing LGBT and cisgender straight people by age

Note: Bold percentages indicate respondents differed significantly (p < .05) by row.

14.0

12.0

8.3

When we separate subgroups by SOGI in Table 7, the sample sizes of the comparison groups get smaller and many of the differences between groups are not statistically significant. Among cisgender men, gay men have similar rates of poverty to straight men across age groups (the differences are not statistically significant), except those in the age range of 35-44 (10.1 vs. 15.2%, respectively) and 55-64 (7.8% vs. 11.3%). Cisgender bisexual men also had similar rates of poverty compared to cisgender straight men, although bisexual men (31.8%) aged 35–44 have significantly higher poverty rates than straight men in the same age range (15.2%). Among cisgender women, there are no significant differences between lesbians and straight women, but bisexual women aged 18-24 (37.3% vs. 31.2%, respectively) and 35-44 (29.1% vs. 21.6%, respectively) have higher poverty rates than cisgender straight women. Transgender people have higher poverty rates than cisgender straight men in every age group, and the transgender poverty rates are statistically significantly higher than for cisgender straight women for the 35–44 and 55–64 age groups.

Table 7. Poverty rates by SOGI and age

45-54

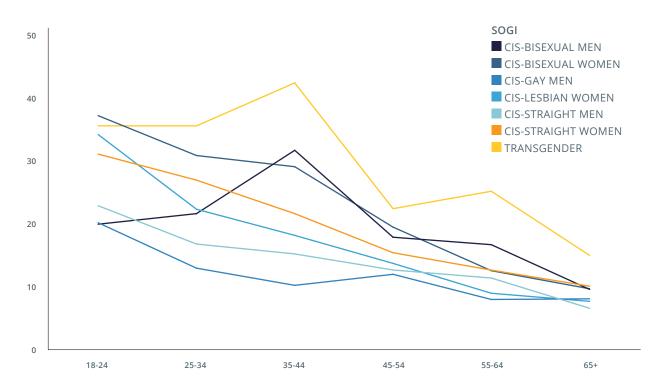
55-64

65+

SOGI	18-24		25-34	25-34 3		35-44		45-54		55-64		65+	
Cis-straight men	23.0	2,620	16.8	3,251	15.2	3,390	12.6	4,253	11.3	4,995	6.4	3,165	
Cis-straight women	31.2	2,951	27.0	5,828	21.6	6,257	15.3	6,646	12.5	7,539	9.9	7,616	
Cis-gay men	20.3	73	12.9	67	10.1	70	11.9	129	7.8	91	7.9	59	
Cis-lesbian women	34.3	67	22.3	104	18.1	81	13.6	100	8.8	61	7.5	31	
Cis-bisexual men	19.9	106	21.6	104	31.8	57	17.8	88	16.6	75	9.4	46	
Cis-bisexual women	37.3	345	30.9	433	29.1	223	19.4	143	12.4	94	9.5	47	
Transgender	35.6	70	35.6	93	42.5	81	22.3	89	25.1	112	14.8	75	

In Figure 7, we present data for each SOGI subgroup across the age ranges, illustrating the general pattern of changes in poverty rates from younger to older (most but not all differences are statistically significant, see Supplemental Table 3 for more detail). We see that transgender people (indicated by the yellow line) have high poverty rates and that both transgender and cisgender bisexual men (dark blue line) follow a similar pattern of experiencing poverty with an uptick at ages 35-44 and 55-64.

Figure 7. Poverty rates by SOGI and age



### LGBT AND CIS-STRAIGHT PEOPLE DIFFER IN WAYS THAT AFFECT THE LIKELIHOOD OF POVERTY

As the previous section shows, poverty rates are influenced by gender, age, race and ethnicity, and urban vs. rural location. Other characteristics also matter, like English proficiency, disability status, education level, health, marital status, employment status, and having children. In this section, we compare these additional characteristics across SOGI, because they might be additional reasons for the heightened vulnerability to poverty for LGBT people noted in the first section. In other words, poverty rates might vary by SOGI because these other characteristics that tend to predict poverty are more common among LGBT people.

To examine patterns in important characteristics related to poverty among LGBT people and create a model for the final test of the impact of SOGI status on poverty, we compare sexual and gender minority groups separately to cisgender straight women and cisgender straight men. This is in line with economic research that acknowledged wage gaps and other inequalities between men and women in the United States. 18 In both sets of analyses, we still compare the full group of transgender survey respondents.

When we look more closely at those descriptive characteristics in Table 8 (comparing subgroups to cisgender straight women) and Table 9 (comparing subgroups to cisgender straight men), we see that LGBT people are more likely to be people of color, young, urban, and disabled—all social statuses and characteristics that are known to be independently related to poverty rates. We point out specific statistically significant comparisons between cisgender straight people and subgroups of LGBT people. For the sake of brevity, we also use bold text and colored numbers in Tables 8 and 9 to indicate which estimates reach statistical significance when compared to cisgender straight women or men.

Table 8. Descriptive variables for cisgender straight women, sexual minority women, and transgender people

DESCRIPTIVE VARIABLES		CIS-LESBIAN AND BISEXUAL WOMEN AND TRANSGENDER PEOPLE		CISGENDER LESBIAN WOMEN		CISGENDER BISEXUAL WOMEN		TRANSGENDER PEOPLE		
	%	N		N						
Age										
18-24	10.5	14,680	29.2	2,184	19.0	345	36.8	1,527	21.9	312
25-34	14.8	31,200	24.5	2,668	18.9	547	30.5	1,777	15.7	344
35-44	15.7	41,765	15.0	1,962	16.3	525	14.4	1,114	14.9	323
45-54	17.6	61,438	12.6	2,308	19.9	925	8.42	893	14.7	490
55-64	18.0	87,767	9.9	2,468	14.5	1,032	5.22	778	16.6	658
65+	23.4	148,269	8.8	2,545	11.4	776	4.77	886	16.2	883
Race										
White	66.3	307,049	61.5	10,243	64.3	3,200	62.4	4,981	55.5	2,062
Black	12.2	32,199	13.9	1,228	14.2	321	13.6	590	14.4	317

DESCRIPTIVE VARIABLES	CISGEN STRAIG	IDER HT WOMEN	WOME	ISEXUAL N AND GENDER	CISGENDER LESBIAN WOMEN		CISGENDER BISEXUAL WOMEN		TRANS(	GENDER E
		N		N						
Hispanic	14.0	22,487	14.8	1,166	12.5	247	14.0	623	19.9	296
American Indian or Alaska Native	0.6	3,711	1.1	228	0.9	63	1.3	116	1.0	49
Asian	5.0	8,999	4.9	333	4.8	70	4.62	163	5.6	100
Native Hawaiian or Pacific Islander	0.2	862	0.4	75	0.5	28	0.4	28	0.3	19
"Other" race	0.3	1,250	0.5	81	0.4	22	0.2	32	1.1	27
Multirace	1.3	8,446	3.0	626	2.4	167	3.6	353	2.2	106
Language										
Non-English	6.1	7,730	3.9	261	1.4	36	2.7	105	10.3	120
Urbanicity										
Urban	84.2	273,163	87.3	10,737	89.1	3,294	87.9	5,323	83.6	2,120
Rural	15.8	111,238	12.7	3,261	10.9	805	12.1	1,582	16.4	874
Disability status										
Disabled	24.3	106,770	35.4	5,006	31.7	1,237	37.0	2,616	35.5	1,153
Education										
Did not graduate from high school	12.1	25,355	14.6	1,149	8.8	195	14.1	523	23.0	431
Graduate high school	27.2	107,429	28.3	3,651	24.5	798	27.6	1,750	34.6	1,103
Attended college or technical school	32.8	111,567	34.4	4,147	32.9	1,038	37.3	2,283	29.0	826
Graduated from college or technical school	27.8	144,335	22.7	5,226	33.9	2,131	21.1	2,432	13.4	663
Marital status										
Married	51.2	194,528	28.6	4,614	27.7	1,262	24.2	2,087	41.0	1,265
Not partnered	44.7	184,045	60.8	8,116	57.5	2,249	65.4	4,249	52.7	1,618
Cohabitating	4.1	9,172	10.7	1,395	14.7	618	10.5	641	6.24	136
Employment										
Employed	44.1	149,766	47.7	6,438	54.4	2,139	47.0	3,181	41.2	1,118

DESCRIPTIVE VARIABLES	CISGEN STRAIG	IDER HT WOMEN	WOME	SEXUAL N AND GENDER	CISGEN LESBIA WOME	N	CISGEN BISEXU WOME	AL	TRANS(	GENDER E
		N		N						
Self- employed	6.16	23,402	7.67	1,084	6.1	307	7.85	537	9.1	240
Non- employed	49.7	214,487	44.7	6,579	39.5	1,700	45.2	3,228	49.7	1,651
General health										
Fair or poor health	18.2	72,555	22.3	3,159	17.7	744	23.4	1,609	24.9	806
Household										
Has a child or children	38.3	99,528	39.1	4,282	31.1	908	45.2	2,668	33.2	706

Note: Bold percentages indicate respondents differed significantly (p < .05) by row when comparing cisgender straight people to LGBT people. Values among LGBT subgroups that differed significantly at the p < .05 level from cisgender straight people are highlighted in blue. For example, 14.8% of cis-straight women are ages 25–34. This is statistically significant from 18.9% of lesbian women and 30.5% of bisexual women, but not statistically significant from 15.7% of transgender people.

Table 9. Descriptive variables for cisgender straight men, sexual minority men, and transgender people

DESCRIPTIVE VARIABLE	CISGENDER STRAIGHT MEN		MEN AND		CISGEN MEN	CISGENDER GAY MEN		CISGENDER BISEXUAL MEN		GENDER E
	%	N	%	N	%					
Age										
18-24	12.5	17,700	22.5	1,551	18.5	580	28.5	659	21.9	312
25-34	16.4	28,524	20.4	1,778	21.9	839	21.5	595	15.7	344
35-44	16.4	33,806	13.4	1,349	13.6	648	12.1	378	14.9	323
45-54	17.7	47,839	16.9	2,317	21.1	1,283	12.5	544	14.7	490
55-64	17.6	66,601	14.8	2,707	15.1	1,347	13.1	702	16.6	658
65+	19.4	94,224	12.0	3,022	9.7	1,200	12.2	939	16.2	883
Race										
White	66.3	228,206	61.0	9,332	65.1	4,566	59.4	2,704	55.5	2,062
Black	10.8	18,504	11.3	943	9.9	347	11.1	279	14.4	317
Hispanic	14.9	17,818	17.4	1,142	15.9	486	17.8	360	19.9	296
American Indian or Alaska Native	0.7	3,179	1.0	169	0.6	45	1.5	75	1.02	49
Asian	5.4	8,971	6.1	402	5.6	147	7.0	155	5.57	100

DESCRIPTIVE VARIABLE	CISGEN STRAIG	IDER HT MEN	CIS-GA BISEXU MEN A TRANS	AL ND GENDER	CISGEN MEN	NDER GAY	CISGEN BISEXU	NDER NAL MEN	TRANS PEOPL	GENDER E
	%	N	%	N	%		%		%	
Native Hawaiian or Pacific Islander	0.2	775	0.3	69	0.3	30	0.4	20	0.3	19
"Other" race	0.4	1,409	0.5	72	0.3	27	0.3	18	1.1	27
Multirace	1.5	7,265	2.6	458	2.3	202	2.5	150	2.2	106
Language										
Non-English	6.0	5,862	5.0	261	2.2	66	5.1	75	10.3	120
Urbanicity										
Urban	84.2	205,485	88.4	9,911	91.1	4,844	88.0	2,947	83.6	2,120
Rural	15.8	81,594	11.6	2,704	8.9	996	12.0	834	16.4	874
Disability status										
Disabled	19.5	62,032	28.4	3,803	24.0	1,453	29.3	1,197	35.5	1,153
Education										
Did not graduate from high school	13.4	20,098	12.8	938	6.34	208	14.4	299	23.0	431
Graduate high school	30.5	82,201	27.6	3,217	22.8	1,052	29.0	1,062	34.6	1,103
Attended college or technical school	29.6	74,662	31.9	3,364	32.5	1,518	33.1	1,020	29.0	826
Graduated from college or technical school	26.4	113,404	27.7	5,237	38.4	3,127	23.4	1,447	13.4	663
Marital status										
Married	54.4	170,261	26.2	3,567	18.1	1,127	26.8	1,175	41.0	1,265
Not partnered	41.1	111,046	63.9	8,023	68.6	3,983	65.6	2,422	52.7	1,618
Cohabitating	4.5	8,439	9.8	1,123	13.4	772	7.6	215	6.24	136
Employment										
Employed	53.0	131,644	49.0	5,756	54.5	2,954	46.9	1,684	41.2	1,118
Self- employed	11.8	33,774	9.6	1,202	10.0	590	9.42	372	9.13	240

DESCRIPTIVE VARIABLE	CISGENDER STRAIGHT MEN		CIS-GAY AND BISEXUAL MEN AND TRANSGENDER PEOPLE		CISGENDER GAY MEN		CISGENDER BISEXUAL MEN		TRANSGENDER PEOPLE	
		N		N						
Non- employed	35.2	124,004	41.4	5,761	35.4	2,355	43.7	1,755	49.7	1,651
General health										
Fair or poor health	16.7	50,765	18.6	2,609	13.9	981	20.7	822	24.9	806
Household										
Has a child or children	34.8	72,881	21.9	1,945	10.6	415	29.5	824	33.2	706

Note: Bold percentages indicate respondents differed significantly (p < .05) by row. Values among LGBT subgroups that differed significantly at p < .05 from cisgender straight people are highlighted in blue.

Starting with age, we see that transgender people and lesbian and bisexual women tend to be younger than cisgender straight women. For example, 19.0% of lesbians, 36.8% of bisexual women, and 21.9% of transgender people are aged 18-24, compared to only 10.5% of cisgender straight women. Similarly, 18.5% of gay men, 28.5% of bisexual men, and 21.9% of transgender people are aged 18-24, whereas only 12.5% of cisgender straight men are in the youngest group.

Turning to race and ethnicity, cisgender straight men and women are more likely than LGBT people to be White—the group least likely to be poor. We see that approximately 66% of cisgender straight women and cisgender straight men are White, but only approximately 61% of sexual and gender minority women and men are White. When combined into one group (the second column of Table 8), transgender people and lesbian and bisexual women are more likely to be Black, American Indian or Alaska Native, Native Hawaiian or Pacific Islander, or multiracial than are cisgender straight women. The combined group of gay and bisexual cisgender men plus transgender people (the second column in Table 9) are more likely to be Hispanic, American Indian or Alaska Native, Native Hawaiian or Pacific Islander, or multiracial than are cisgender straight men. Most of the comparisons between the subgroups of LGBT people and cisgender straight people were not statistically significant. One notable exception is that transgender people were more likely to be Hispanic compared to either cisgender straight men or women, and they were more likely to be Black than cisgender straight men.

As noted in Figure 3, LGBT people are more likely to live in urban areas than cisgender straight people. We see that 15.8% of cisgender straight men and women live in rural areas, but only 11.6% of gay and bisexual men and transgender people and 12.7% of lesbian and bisexual women and transgender people live in rural areas.

Disability status is also more common for LGBT people: 35.4% of lesbian and bisexual women and transgender people versus 24.3% for cisgender straight women, and 28.4% of gay and bisexual men and transgender people versus 19.5% for cisgender straight men.

A second set of characteristics that might affect the relationship between SOGI and poverty includes education, marital status, employment status, and health. However, their relationship to poverty is more complicated than the ones already discussed. Having lower levels of education, being single (non-partnered) or partnered with a low-income person, being unemployed, and having poor health make poverty more likely for families and individuals. Conversely, being poor also makes those characteristics more likely. Getting a college degree is more difficult without financial resources. One may be less likely to have a partner or marry if poor. Having a stable home and resources for a job search are also more challenging if poor. Poverty can create stress that leads to poorer health.

Looking at these more complicated factors, we again see that LGBT people, and particularly bisexual and transgender people, are more likely to have some of those characteristics associated with higher poverty. Starting with the combined LGBT groups, we see in Table 8 that cisgender lesbian and bisexual women and transgender people have generally lower education levels; they are more likely to have not graduated from high school and are less likely to have graduated from college than cisgender straight women. Once we divide up the LGBT group, we see that bisexual women and transgender adults had lower education levels than cisgender straight women, lesbians had higher education levels than cisgender straight women. In Table 9, cisgender gay and bisexual men and transgender people are more likely to have attended college. Bisexual men and transgender adults had lower education levels than cisgender straight men, whereas gay men had higher education levels than cisgender straight men.

Turning to marital status, cisgender lesbian and bisexual women plus transgender people (60.8%) are more likely to be non-partnered than cisgender straight women (44.7%), as are cisgender gay and bisexual men plus transgender people men compared with cisgender straight men (63.9% vs. 41.1%, respectively).

Employment status shows differences between groups, too. Cisgender lesbian and bisexual women and transgender people are more likely to be employed than cisgender straight women (47.7% vs. 44.1%, respectively), but cisgender gay and bisexual men and transgender people are less likely to be employed than cisgender straight men. In particular, cisgender bisexual men and transgender adults were less likely to be employed than cisgender straight men.

Turning to health, LGBT people as a group are more likely to report being in fair or poor health (compared to great or good health) than cisgender straight women or men. However, the picture is more complicated when looking at the LGBT subgroups separately. Gay men are less likely to report fair or poor health than cisgender straight men, and lesbians have similar health as cisgender straight women. But bisexual women and men and transgender adults are more likely to report worse health than their cisgender straight counterparts.

These tables (and other research) show that LGBT people and cisgender heterosexual people have very different patterns of characteristics that predict whether someone will be poor. To know more precisely how SOGI independently influences the risk of poverty, we want to take those other differences into account.

The patterns are also complex. On one hand, cisgender gay and bisexual men have higher levels of education and fewer children, both of which protect them from poverty. On the other hand, they are less likely to be partnered, to be employed, or to be in good health, which tend to increase their risk of poverty. Cisgender lesbian and bisexual women are protected by having higher levels of employment than cisgender straight women but are at risk because of less education (for bisexual women), poorer health, and lower partnership rates. This complexity requires a more sophisticated statistical method to make detailed comparisons, which we describe next.

### LGBT PEOPLE ARE MORE LIKELY TO EXPERIENCE POVERTY AFTER ACCOUNTING FOR OTHER KNOWN FACTORS

In this section, we explore the effect of SOGI on the probability of being poor, accounting for the other relevant factors described in the previous section. The statistical technique we used allowed us to control for the other characteristics that are known to also predict poverty—that way we can answer the question of whether SOGI is associated with poverty above and beyond known determinants of poverty. For this detailed analysis, we condensed some variables (age, race, education, marital status, and employment status) into fewer categories because of the relatively small sample sizes of some subgroups. In this section, we present the main findings, with details of the statistical analysis in the appendix.

As in the comparisons in the previous section, we did two separate comparisons: one compared the probability of poverty for lesbian and bisexual women and transgender people to the probability for cisgender straight women, and the other compared gay and bisexual men and transgender people to cisgender straight men. For each set of comparisons, we first tested the effect of being part of the LGBT collective, and then tested whether being part of a specific subgroup of the LGBT population is a significant predictor of poverty.

Our statistical method gives us a comparison of the odds of being poor (the "odds ratio") for the LGBT group compared to the cisgender straight group. Odds ratios are a way of measuring how likely someone is to be poor. If 15% of cisgender straight people are poor and 85% are not poor, the average cisgender straight person's odds of poverty are 15/85, or 0.176. If 20% of LGBT people are poor and 80% are not poor, their odds of poverty are 20/80, or 0.25. The odds ratio that compares the odds for LGBT people to that of cisgender straight people is 0.25/0.176, or 1.42. Thus, the odds of poverty are 42% (0.42) higher for LGBT people in this example.

First, we look at the role of SOGI in predicting women's poverty. When we account for age, race and ethnicity, urban vs. rural location, English proficiency, disability status, education level, health, marital status, employment status, and having children, lesbian and bisexual cisgender women and transgender people combined are more likely to be poor than cisgender straight women (Figure 8). Their odds of being poor are 17% higher than the odds for cisgender straight women. Separating the LGBT group into lesbians, bisexual women, and transgender people shows that the difference is driven by a higher risk of poverty for bisexual women (17% higher) and transgender people (38% higher). Lesbians are neither more likely nor less likely to be poor than cisgender straight women.

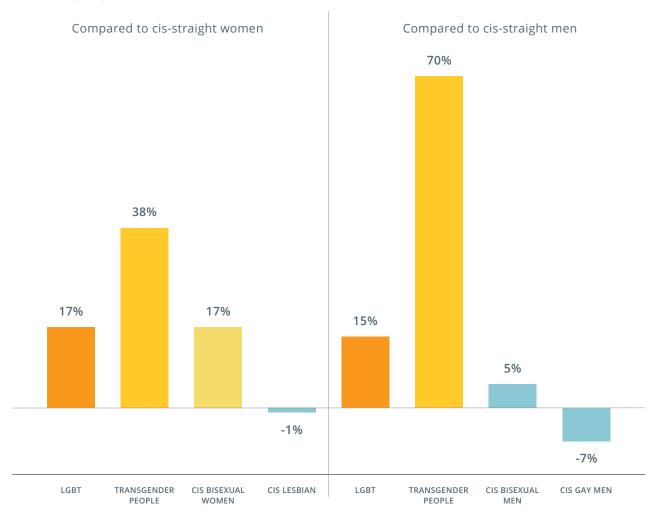


Figure 8. Odds of living in poverty compared to cisgender straight women and men - LGBT and LGBT subgroups

Note: The orange and yellow bars represent statistically significant differences in probabilities of poverty compared to cisgender straight women or men; the gray bars indicate the difference is not statistically significant. See Appendix Table 3 for more details.

When we look at men's poverty, we see a similar finding. Gay and bisexual men and transgender people have a 15% higher likelihood of being poor than cisgender straight men (Figure 8). But subgroup analysis shows that gay and bisexual men are neither more nor less likely (statistically) than cisgender straight men to be poor; transgender people are 70% more likely to be poor than cisgender straight men.

Overall, the higher odds of being poor for LGBT people are driven mainly by a greater risk of poverty for transgender people and, to some extent, for bisexual people.

### **FUTURE RESEARCH SUGGESTIONS**

Although this study's findings allow us to better understand poverty for LGBT people, including subgroups of LGBT identities, than previous reports, we are still limited in the strength of conclusions that we can draw because of the limited size of the sample of LGBT people.

As we note in several places, small sample sizes of subgroups especially limit our ability to make comparisons and draw conclusions about the risks of poverty for LGBT people, particularly in relation to other important characteristics such as race and age. For example, higher rates of poverty among Black cisgender lesbian and transgender people compared to cisgender straight women do not approach statistical significance, though the rates of poverty are higher. When combined into an LGBT group (achieving a larger sample size), they are significantly different than the cisgender straight group. We could not perform detailed comparisons for different groups of transgender people for the same reason. To see the impact of the small sample sizes, see the Supplemental Tables—the small samples tend to have wider confidence intervals, which make it harder to detect differences among groups.

Beyond poverty rates, although the proportions of LGBT people in this sample are similar to other estimates of the LGBT population (4.5% from Gallup Daily Tracking Survey<sup>14</sup>), the sample sizes are likely too small for some nuanced analyses because the total samples for the survey were not big enough to identify enough LGBT people in various minority groups (by race, age, and region). Additionally, SOGI data were not collected in each state every year, which affected sample sizes. This limitation also likely affected the LGBT versus cisgender straight comparisons. We found that many states did not show significant differences among SOGI groups, but these are also the states with the smallest samples of LGBT people.

Finally, we have data from only 35 states, which limits our ability to generalize our findings to the national level. Because states vary in terms of laws and policies that are inclusive of LGBT people, we would want to take state-level factors into account that may be associated with poverty, but the small sample size in each state makes that impossible. Overall, having data from all states and having larger sample sizes will be necessary to conduct more detailed research on the contextual influences on LGBT poverty.

### CONCLUSION

Looking at the basic poverty rates for women tells us a story that is consistent with the statistical analysis. Lesbian cisgender women have similarly high poverty rates as cisgender straight women, and bisexual women and transgender people are much more likely to be poor than cisgender straight women. This difference remains even after accounting for the many differences (e.g. age, race/ethnicity, and education) among lesbians, bisexual women, transgender people, and cisgender straight women.

Gay and straight cisgender men at first appear to have similarly low (when compared to women) poverty rates, and bisexual cisgender men and transgender people have higher poverty rates than cisgender straight men. After accounting for differences in race, age, education, and other relevant characteristics, gay men are indeed just as likely to be poor as cisgender straight men. In addition, the higher rates of poverty initially seen for bisexual men disappeared after accounting for their different characteristics compared to cisgender straight men. We find that transgender people consistently have the highest odds of being poor among all groups, even after accounting for their characteristics.

Where people live matters for poverty rates. In particular, LGBT people are less likely to live in rural areas compared to cisgender straight people, but LGBT people living in rural areas have particularly high rates of poverty.

Taken together, this report extends our knowledge of LGBT poverty. Using a new dataset with more detailed measures of SOGI and a much larger sample size than previous studies revealed important differences in the collective group of LGBT people. Being LGBT increases the risk of poverty overall, and for bisexual and transgender people, in particular. In addition, this report also identifies a range of contributors to elevated rates of poverty among LGBT people, including lower educational attainment, unemployment, poor health, and disability. Addressing these differences, as well as ensuring access to employment through legal protections, may serve to reduce poverty among LGBT adults.

### **AUTHORS**

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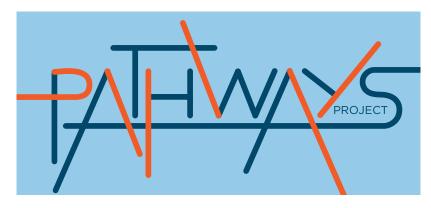
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### PATHWAYS TO JUSTICE PROJECT

The Pathways to Justice Project is multiple method long term project examining poverty rates, exploring the life narratives, and documenting experiences with economic development and food insecurity services among LGBTQ people. We rely on government survey data and in-person interviews to study economic insecurity among LGBTQ people to answer the following questions: 1) How do LGBTQ poverty rates and other measures of economic insecurity vary across states and between urban and rural areas within states?; 2) Do adequate services exist to serve LGBTQ adults living in poverty?; 3) What are the social, psychological, and contextual factors, or "root causes," associated with high rates of LGBTQ poverty?; and 4) How do other social statuses (race, immigration status, etc.) complicate narratives of LGBT poverty. Paired together, quantitative surveys and qualitative interviews for

learning the stories of LGBTQ people living in poverty will better equip the community to advocate for policy change by distilling down complex survey data that is not easily accessible to the public. Combining these methods of understanding LGBTQ poverty also allows for us document experiences of



poverty among subgroups who may not have higher rates of poverty (e.g., gay cisgender men), and yet are nonetheless represented among those experiencing economic insecurities. Also, it allows us to fill in the gaps that survey data cannot fill through answering questions about "how" and "why" disparities exist, and "what do we do now?". For more information about the overall project, please visit: www.pathways-study.org.

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The Williams Institute is dedicated to conducting rigorous, independent research on sexual orientation and gender identity law and public policy. A think tank at UCLA Law, the Williams Institute produces high-quality research with real-world relevance and disseminates it to judges, legislators, policymakers, media and the public. These studies can be accessed at the Williams Institute website.

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### APPENDIX: METHODS

#### **DATA SOURCE**

The Behavioral Risk Factor Surveillance System (BRFSS) is a national telephone survey of more than 400,000 adults designed to collect information on health behaviors, conditions, and services. It is funded by the Centers for Disease Control and Prevention (CDC). It is administered at the state level by state health departments, universities, or call centers using a random-digit-dialing method on both landlines and mobile phones to adults aged 18 or older, and respondents answer questions over the telephone. Data on health indicators such as usage of health services, chronic health conditions, and health-related risk behaviors are collected annually on an ongoing basis in 50 U.S. states and three U.S. territories. The BRFSS includes a standardized core set of questions that are asked in every state, optional modules that states choose to include, and other specific state-added questions. For more information, please see the BRFSS website.<sup>19</sup>

Since 2014, the CDC has allowed states to include an optional module with standardized SOGI questions in the BRFSS survey. During the 2014–2017 period, 35 states included these questions at least once, and the CDC included the results from that module in the publicly available BRFSS dataset.<sup>d</sup> During the 4-year period, the number of states that included the SOGI questions increased. In 2014, 19 states (with 31.7% of the U.S. population) included the SOGI questions. In 2015 and 2016, 22 states (with 50.8% of the U.S. population) and 25 states (with 64.3% of the U.S. population), respectively, included the SOGI questions. In 2017, 27 states (with 73.4% of the U.S. population) included the SOGI questions.

#### **SAMPLE**

For this report, the study sample was limited to the 35 states that included the SOGI module at least once (see Table Appendix 1). For the 35 states across four years, we had 93 state-level modules that we combined into one dataset for analysis. For sample size reasons, BRFSS 2014, 2015, 2016, and 2017 data were combined.

<sup>&</sup>lt;sup>d</sup> Other states have included different questions on sexual orientation in earlier years, but the responses to those questions are not included in the public use dataset from BRFSS.

### Sexual Orientation and Gender Identity Measure in Module

#### 1. Do you consider yourself to be:

INTERVIEWER NOTE: Please say the number before the "yes" text response. Respondent can answer with either the number or the text/word.

#### Please read:

- 1 Straight
- 2 Lesbian or gay
- Bisexual

#### Do not read:

- Other
- 7 Don't know/Not sure
- Refused

#### 2. Do you consider yourself to be transgender?

If yes, ask "Do you consider yourself to be 1. male-to-female, 2. female-to-male, or 3. gender nonconforming?

INTERVIEWER NOTE: Please say the number before the "yes" text response. Respondent can answer with either the number or the text/word.

- 1 Yes, Transgender, male-to-female
- 2 Yes, Transgender, female-to-male
- 3 Yes, Transgender, gender nonconforming
- 4 No
- Don't know/Not sure
- Refused

#### INTEVIEWER NOTE: If asked about definition of transgender:

Some people describe themselves as transgender when they experience a different gender identity from their sex at birth. For example, a person born into a male body, but who feels female or lives as a woman would be transgender. Some transgender people change their physical appearance so that it matches their internal gender identity. Some transgender people take hormones and some have surgery. A transgender person may be of any sexual orientation-straight, gay, lesbian, or bisexual.

INTERVIEWER NOTE: If asked about definition of gender non-conforming:

Some people think of themselves as gender non-conforming when they do not identify only as a man or only as a woman.

Appendix Table 1. States that included the SOGI module by year

SOGI MODULE ASKED IN BRFSS SURVEY BY YEAR				TOTAL YEARS OF DATA INCLUDED BY STATE	STATES
2014	2015	2016	2017		
		1	1	2	California
	1			1	Colorado
	1	1	1	3	Connecticut
1	1	1	1	4	Delaware
			1	1	Florida
	1	1	1	3	Georgia
1	1	1	1	4	Hawaii
1	1	1		3	Idaho
	1	1	1	3	Illinois
1	1	1	1	4	Indiana
1	1	1	1	4	lowa
1	1			2	Kansas
1		1		2	Kentucky
1		1	1	3	Louisiana
1	1			2	Maryland
	1	1	1	3	Massachusetts
1	1	1	1	4	Minnesota
		1	1	2	Mississippi
	1	1		2	Missouri
1			1	2	Montana
1	1	1	1	4	Nevada
1	1	1	1	4	New York
			1	1	North Carolina
1	1	1	1	4	Ohio
			1	1	Oklahoma
1	1	1	1	4	Pennsylvania
		1	1	2	Rhode Island
			1	1	South Carolina
	1	1	1	3	Texas
1		1	1	3	Vermont
1	1	1	1	4	Virginia
		1	1	2	Washington
	1			1	West Virginia
1	1	1	1	4	Wisconsin
1				1	Wyoming
19	22	25	27		35 States

The sample is further limited to individuals who provided a response to the SOGI measures in these states. A total of 704,715 individuals are included in the analysis of this report, with 680,752 individuals identified as cisgender straight and 23,963 individuals as LGBT.º Because not everyone provided information on all variables, sample sizes for some variables are smaller.

Appendix Table 2. BRFSS sample by sexual orientation and gender identity status

SOGI	%	N
Cis-straight men	46.3	291,078
Cis-straight women	49.4	389,600
Cis-gay men	1.0	5,921
Cis-lesbian women	0.6	4,167
Cis-bisexual men	0.7	3,835
Cis-bisexual women	1.4	7,000
Transgender	0.5	3,037
Total		704,638

#### **MEASURES**

### Sexual orientation and gender identity

In theory, all respondents should have a sex, a sexual orientation, and a gender identity. Respondents were assigned a sex by the interviewer based on either voice or starting in 2016, their answer to a screening question about gender. All were asked the sexual orientation question. Anyone answering yes to the transgender question received a follow-up question (see Appendix Box 1). However, some people did not respond with a clear identity category to the SOGI questions (for those questions, people had additional options: other, don't know or not sure, or refuse). Therefore, we used both the sexual orientation question ("sxorient") and the transgender identity question ("trnsgndr") to categorize each person into one LGBT category. First, we categorized each person as transgender, cisgender male, or cisgender female based on the BRFSS sex variable and the transgender question. Second, if the answer to the transgender question was effectively missing, we then categorized them according to their answer to the sexual orientation question. In this second step, we also used the sexual orientation question to assign a category—straight, lesbian, gay, or bisexual—to each cisgender person.

Respondents who answered "other" or "don't know or not sure" were included in the regression analysis as an "unknown" group, but we do not report findings on that group because we know nothing about their sexual orientation or gender identity. Respondents who declined to answer the question were not included in the analysis. However, we note that people whose SOGI are unknown have the highest poverty rates: 53.5% for women and 45.9% for men. Prior research has found that individuals with low levels of formal education are more likely to report "don't know" to sexual orientation identity questions.<sup>20</sup>

e This total sample size and the sample size reported in Appendix Table 2 differ because not everyone who answered the SOGI questions provided information about their gender (male or female), which we used to categorize the cisgender straight, lesbian, gay, and bisexual groups.

### **Poverty**

The poverty variable was created from BRFSS data based on the federal poverty thresholds provided by the U.S. Census Bureau for each respective year of 2014, 2015, 2016 and 2017.18 Using number of adults in the household, number of children under the age of 18 in the household, and household income, respondents were categorized as either experiencing poverty or not. Because the BRFSS annual household income variable is a categorical variable of an income range with eight categories (i.e., less than \$10,000; \$10,000 to less than \$15,000; \$15,000 to less than \$20,000; \$20,000 to less than \$25,000; \$25,000 to less than \$35,000; \$35,000 to less than \$50,000; \$50,000 to less than \$75,000; and \$75,000 or more) rather than an exact income that is used by the U.S. Census Bureau, we used the income midpoint (i.e., \$12,500 for respondents who answered \$10,000 to less than \$15,000) as a comparison point.21 (We also found that using the midpoint to calculate the poverty threshold resulted in proportions closer to the official poverty threshold reported by the U.S. Census Bureau.) For example, suppose a household features two adults and one child and has an annual income in the \$15,000-\$19,999 category in 2015. We counted the adult BRFSS respondent as below the poverty line because the midpoint of that income range is \$17,500, falling below the poverty threshold of \$19,078 for that household size (number of children and adults) and age configuration in 2015.

#### Covariates

Other data collected in the BRFSS include demographics that predict poverty: being female, being a person of color, being young or old, not speaking English, and having a disability. Other characteristics are included that are both effects and potential contributing causes of poverty. Those variables include education, marital status, employment, health, and having a child or children.

Demographic variables include age, race, language, urbanicity, and disability status. Age is categorized into five categories (18–24, 25–34, 35–44, 45–54, 55–64, and 65+), and the collapsed variable features three categories (18-34, 35-64, and 65+). Race is categorized into eight categories (White, Black, Hispanic, American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, other race, and multirace), and it is also collapsed into four categories (White, Black, Hispanic, and other, which includes the other races). The language variable was measured as English and non-English using the language in which the questionnaire was taken. Using a six-category variable of urbanicity from the National Center for Health Statistics' Urban-Rural Classification Scheme for Counties 2013,22 urbanicity was categorized into two groups: urban or rural. Disability is a combined variable indicating whether a respondent has at least one disability among blindness, difficulty concentrating or remembering, difficulty walking or climbing stairs, difficulty dressing or bathing, or difficulty doing errands alone.

Additional variables include education, marital status, employment, general health, and whether the respondent has a child or children or not. The education variable was categorized into four groups (did not graduate high school, graduated high school, attended college or technical school, and graduated college or technical school) and also collapsed into two groups (high school graduate or less, some college or more). Marital status is categorized into married, not partnered, and cohabitating. Employment is grouped by employed, self-employed, or non-employed and grouped into a two-category variable of employed or self-employed versus non-employed. Self-reported

general health was transformed into a bivariate measure of good or better health and fair or poor health. We also measured whether having a child or children in the household affected the poverty status of an individual.

#### **WEIGHTS**

BRFSS data is weighted to ensure the data are representative of the population based on various demographic characteristics, such as sex, race, education, marital status, home ownership, phone ownership (landline, cellular, or both) and substate region.23 With the exception of the 2015 SOGI module data for Iowa, which has the final weight "\_LCPWTV1," all other 2014, 2015, 2016, and 2017 SOGI modules have the same final weight variable of "\_LLCPWT." The final weight is assigned to each respondent in datasets in which data collected through landline telephones and cellular telephones are combined. Before combining the datasets, the different weights variables were reconciled to one final weight variable, "\_LLCPWT," for each year of data.

For analysis of the combined 2014, 2015, 2016, and 2017 BRFSS data, we created a final weight variable ("NEWWT") divided by 4 to account for the correct representation of U.S. population in a given year.

For state-level analysis, the final weight variable was divided by the number of years the SOGI module was included. For example, BRFSS 2016 and BRFSS 2017 included the SOGI module. Therefore, the weight applied for California-level analysis is the final weight divided by 2 (NEWWT=\_LLCPWT/2).

#### **ANALYTIC APPROACH**

All analysis was stratified by gender because gender is an important predictor of poverty, with women's poverty rate exceeding that of men.<sup>18</sup> We combined the BRFSS data on sex (male or female) and gender identity (transgender or cisgender) to create a single gender variable of women and men. All respondents who identified as transgender (n = 3,037) were included with the samples of both women (n = 403,804) and men (n = 303,871) in the descriptive tables and regression model. Although the transgender status question asked whether the respondent identified as male-to-female, femaleto-male, or gender nonconforming, we combined transgender people in one group because as previously mentioned, the sample size of transgender people is relatively small, making comparisons difficult if we were to divide transgender people into their different gender identities. It also avoided assumptions about whether experiences related to economic insecurity compared to cisgender men and women need to be framed in terms of sex assigned at birth or current gender identity.

### DETAILED FINDINGS FROM MULTIVARIATE ANALYSES

Because someone is either poor or not, we used a technique known as logistic regression (or logit) that is appropriate for an outcome measure with two possible options. We started first with the characteristics that predict poverty but aren't likely to be determined by poverty: age, race, language, urbanicity, and disability. Our second set of statistical models added the characteristics that have a more complicated relationship to poverty, as discussed in the previous section: education, employment, marital status, health, and whether there are any children in the household. In our analysis, we first used the characteristics with the categories shown in Tables 8 and 9 (see Supplemental Table 6 for results). We then used a collapsed version of the same characteristics described in the Covariates section under Measures, because some of the subgroups had small sample sizes. The results for this analysis are shown in Appendix Table 3.

In Appendix Table 3, the odds ratio column shows the effect of each variable on the odds of being poor compared to the reference characteristic, which is the value of the variable that is not included in the model. f If the odds ratio is 1, the odds are the same for the characteristic defined by the variable and the reference group. If it's less than 1, the characteristic reduces the odds relative to the reference group, and if greater than 1, it increases the odds.

For example, in Model 1 in Appendix Table 3, the odds ratio for being Hispanic is 2.30. Because the odds ratio is greater than 1, that means that the odds of being poor are higher for Hispanic respondents compared to White respondents (the variable that is not included). In other words, a statistically significant odds ratio less than 1 means that there is a negative correlation between that variable and poverty. Having a p-value less than 5% indicates that the effect is not likely to be due to chance. If the odds ratio is greater than 1, it indicates a positive correlation.

We started by combining all transgender people and lesbian and bisexual women (or gay and bisexual men) into one category and compared them to cis-straight women (or cis-straight men). In Model 1 for women in Appendix Table 3, being lesbian, bisexual, or transgender has an odds ratio of 1.17, showing that being a lesbian or bisexual woman or a transgender person made it more likely to be poor after holding constant age, race, language, urbanicity, disability, education, marital status, employment status, health, children, and year of the survey. The other variables had the expected effects on the odds of being poor. Being older and having a higher level of education reduced the odds of being poor. Being a person of color, living in a rural area, having a disability, taking the survey in a language other than English, not being in a married couple, not being employed, being in fair or poor health, and having children all increased the odds of being poor.

Because Figure 2 shows that transgender people and bisexual women have higher poverty rates on average than everyone else, we wanted to see the separate impact of being in each group on the risk of poverty. The second model in Appendix Table 3 assessed lesbian and bisexual women and transgender people as separate variables. Here we see that being a lesbian has no impact on being

f Odds are related to but different than probabilities. The odds of poverty for a group is the number of people who are poor divided by the number of people who are not poor. The probability of being poor is the number of people who are poor divided by the total number of people in the group. So, the numerators are the same, but the denominators are different. The statistical procedure we used produces odds ratios to enable simple comparisons.

poor, but bisexual women (odds ratio: 1.17), transgender people (odds ratio: 1.17), and women with unknown SOGI status (odds ratio: 1.72) are more likely to be poor compared to cis-straight women, holding all other factors equal.

Models 3 and 4 in Appendix Table 3 show the findings for men and transgender people. Again, for men, we first combined gay and bisexual men and all transgender people to compare them to cisgender heterosexual men. Model 3 for men shows that people in the combined gay and bisexual men or transgender people category are more likely to be poor than cis-straight men, with an odds ratio of 1.15, holding all else equal. As with women, older people and those with higher levels of education are less likely to be poor, whereas people of color, non-English speakers, rural people, people with disabilities, those not married, those not employed, those in poor health, and those with children in the household are more likely to be poor. In Model 4 of Appendix Table 3, we split grouping of gay and bisexual men and transgender people. We see that gay men are less likely and bisexual men are no more likely to be poor than cis-straight men after controlling for these factors. Only transgender people are significantly more likely to be poor than cis-straight men (odds ratio: 1.70), holding the other factors constant.

#### Appendix Table 3. Logistic Regression Results

	WOMEN		MEN		
OUTCOME: EXPERIENCING POVERTY	MODEL 1	MODEL 2	MODEL 3	MODEL 4	
	ODDS RATIO	ODDS RATIO	ODDS RATIO	ODDS RATIO	
SOGI (ref: cis-straight)					
LGBT	1.17**		1.15**		
Lesbian or gay		0.99		0.93	
Bisexual		1.17**		1.05	
Transgender		1.38**		1.70***	
Unknown	1.72***	1.72***	1.84***	1.85***	
Age (ref: 18-34)					
35-64	0.65***	0.65***	0.75***	0.75***	
65+	0.26***	0.26***	0.26***	0.26***	
Race (ref: White)					
Hispanic	2.30***	2.30***	2.38***	2.39***	
Black	2.29***	2.29***	2.48***	2.47***	
Other	1.92***	1.91***	2.23***	2.22***	
Language (ref: English)					
Language other than English	3.63***	3.62***	4.22***	4.20***	
Geography (ref: Urban)					
Rural	1.41***	1.41***	1.26***	1.26***	
Disability (ref: has no disabilities)					
Has at least one disability	1.86***	1.85***	1.78***	1.78***	
Education (ref: HS grad or less)					
Some college or more	0.37***	0.37***	0.44***	0.44***	
Marital status (ref: married)					
Not partnered	3.48***	3.48***	2.34***	2.35***	
Cohabitating	2.55***	2.56***	2.02***	2.03***	

	WOMEN		MEN	
OUTCOME: EXPERIENCING POVERTY	MODEL 1	MODEL 2	MODEL 3	MODEL 4
	ODDS RATIO	ODDS RATIO	ODDS RATIO	ODDS RATIO
Employment (ref: employed or self-employed)				
Non-employed	2.61***	2.61***	3.62***	3.61***
General health (ref: good or better health)				
Fair or poor health	1.84***	1.84***	1.61***	1.61***
Child or children in household (ref: no)				
Yes	3.13***	3.13***	2.42***	2.41***
Year (ref: 2014)				
2015	0.90***	0.90***	0.85***	0.85***
2016	0.91***	0.91**	0.90**	0.90**
2017	1.02	1.02	0.95	0.95
_cons	0.05	0.04	0.04	0.04

<sup>\*</sup>p < .10; \*\*p < .05; \*\*\*p < .01

# **SUPPLEMENTAL TABLES**

Below are the tables reported throughout the report, but now including the confidence intervals for all the estimates.

## Supplemental Table 1. Poverty rates and 95% confidence intervals by SOGI

SOGI	%	95% CI	N
Cis-straight	15.7	(15.4, 15.9)	58,773
LGBT	21.6	(20.5,22.9)	3,222

SOGI	%	95% CI	N
Cis-straight men	13.4	(13.1, 13.7)	21,757
Cis-straight women	17.8	(17.5, 18.2)	37,008
Cis-gay men	12.1	(10.4, 13.9)	492
Cis-lesbian women	17.9	(15.1, 21.2)	444
Cis-bisexual men	19.5	(16.8, 22.6)	476
Cis-bisexual women	29.4	(27.1, 31.8)	1,286
Transgender	29.4	(25.7, 33.5)	523

TRANSGENDER PEOPLE	%	95% CI	N
Trans men	33.7	(26.8, 41.4)	172
Trans women	29.6	(24.1, 35.7)	242
Gender nonconforming	23.8	(17.7, 31.3)	109

## Supplemental Table 2. Poverty rates and 95% confidence intervals by SOGI and by race and ethnicity

RACE/ETHNICITY	CIS-ST	RAIGHT		LGBT			
White	9.1	(8.9,9.3)	32,049	15.4	(14.2, 16.6)	1,802	
Black	25.3	(24.5,26.1)	8,986	30.8	(27, 34.9)	382	
Hispanic	38	(37.1, 39)	10,362	37.3	(33.1, 41.7)	520	
American Indian or Alaska Native	26.9	(24.6,29.4)	1,438	32.4	(23.6,42.6)	101	
Asian	14.6	(13.4,15.9)	1,819	22.9	(17.2, 29.8)	102	
Native Hawaiian or Pacific Islander	25.4	(20.9,30.6)	437	28.9	(15.9, 46.6)	33	
Other race	14.8	(12.1, 17.9)	266	42.1	(26.4, 59.6)	29	
Multirace	20.8	(19.1, 22.7)	2509	22.3	(16.9, 28.8)	186	

RACE/ETHNICITY	WHITE		BLACK	BLACK			OTHER	OTHER	
Cis-straight men	7.6 (11,702)	(7.38, 7.878)	21.8 (2,833)	(20.7, 23)	32.5 (4,014)	(31.3, 33.9)	15.7 (2,810)	(14.5, 16.9)	
Cis-straight women	10.5 (20,345)	(10.3, 10.8)	28 (6,150)	(27, 29.1)	43.6 (6,347)	(42.3, 45)	18.5 (3,659)	(17.1, 20)	
Cis-gay men	8.1 (287)	(6.81, 9.81)	17.1 (45)	(11.4, 24.9)	24 (88)	(17.6, 32)	15.4 (67)	(9.46, 24.2)	
Cis-lesbian women	10.7 (251)	(8.73, 13.1)	31.3 (63)	(23.1, 40.8)	34.8 (49)	(21.6, 51.1)	27.5 (72)	(16.1, 42.8)	
Cis-bisexual men	14.6 (258)	(12, 17.7)	20.3 (43)	(13.3, 29.6)	33.6 (80)	(23.8, 45.2)	22.5 (80)	(16.1, 30.5)	
Cis-bisexual women	23.4 (755)	(21, 26.2)	39.7 (154)	(32.4, 47.6)	45.4 (201)	(38.3, 52.8)	26.9 (155)	(20.5, 34.3)	
Transgender	18.6 (250)	(15.2, 22.7)	38.5 (77)	(28.4, 49.8)	48.4 (102)	37.4, 59.6)	35.2 (77)	(23.7, 48.6)	

	WHITE		BLACK		HISPAN	IC	AMERIC INDIAN ALASKA		ASIAN		NATIVE HAWAII OR PAC ISLAND	AN IFIC	OTHER	RACE	MULTIRA	ACE
SOGI																95% CI
Cis-straight	7.6	(7.38,	21.8	(20.7,	32.5	(31.3,	23	(20,	13.8	(12.4,	17.2	(12.6,	13.1	(9.87,	19.1	(16.5,
men	(11,702)	7.878)	(2,833)	23)	(4,014)	33.9)	(550)	26.3)	(902)	15.5)	(197)	23)	(128)	17.3)	(1,033)	22.1)
Cis-straight women	10.5	(10.3,	28	(27,	43.6	(42.3,	31	(27.5,	15.2	(13.4,	33.5	(26.1,	16.8	(12.7,	22.6	(20.5,
	(20,345)	10.8)	(6,150)	29.1)	(6,347)	45)	(888)	35)	(917)	17.4)	(240)	41.8)	(138)	22.1)	(1,476)	24.9)
Cis-gay men	8.1	(6.81,	17.1	(11.4,	24	(17.6,	21.2	(6.07,	15	(6.84,	18	(5.77,	41.1	(17.7,	10.6	(5.95,
	(287)	9.81)	(45)	24.9)	(88)	32)	(11)	53)	(13)	29.9)	(6)	44.3)	(7)	69.6)	(30)	18.3)
Cis-lesbian	10.7	(8.73,	31.3	(23.1,	34.8	(21.6,	41.8	(23,	22.5	(8.61,	44.3	(11.8,	31.3	(8.29,	30.1	(12.9,
women	(251)	13.1)	(63)	40.8)	(49)	51.1)	(15)	63.5)	(17)	47.4)	(7)	82.5)	(5)	69.8)	(28)	55.7)
Cis-bisexual	14.6	(12,	20.3	(13.3,	33.6	(23.8,	23.2	(12.2,	23.5	(14.6,	17.1	(4.19,	14.5	(4,	20.2	(10.2,
men	(258)	17.7)	(43)	29.6)	(80)	45.2)	(20)	39.9)	(24)	35.8)	(6)	49.5)	(4)	40.9)	(26)	36.4)
Cis-bisexual	23.4	(21,	39.7	(32.4,	45.4	(38.3,	44.8	(27.8,	22.8	(13,	28.3	(8.9,	22.4	(7.49,	25	(17.4,
women	(755)	26.2)	(154)	47.6)	(201)	52.8)	(39)	63.2)	(25)	37)	(8)	61.7)	(4)	50.7)	(79)	34.7)
Transgender	18.6 (250)	(15.2, 22.7)	38.5	(28.4, 49.8)	48.4 (102)	37.4, 59.6)	18.6	(7.16, 40.6)	35.1 (23)	(19, 55.5)	35.9 (6)	9.09, 76)	63.5	(32.5, 86.3)	28.9 (23)	(13.5, 51.7)

# Supplemental Table 3. Poverty rates and 95% confidence intervals by SOGI and age

AGE	CIS-STRAIGH	Т		LGBT			
18-24	26.9	(25.9, 27.9)	5,571	30.7	(27.7, 33.9)	661	
25-34	21.8	(21.2, 22.5)	9,080	24.7	(22.3, 27.4)	801	
35-44	18.5	(17.9, 19.1)	9,649	24.8	(21.5, 28.4)	513	
45-54	14	(13.6, 14.5)	10,900	15.8	(13.8, 17.9)	549	
55-64	12	(11.6, 12.4)	12,537	13.5	(10.7, 16.7)	433	
65+	8.35	(8, 8.71)	10,782	9.81	(7.64, 12.5)	258	

SOGI	18	-24	25	-34	35	-44	45	-54	55	-64	6	5+
												95% CI
Cis-straight	23	(21.8,	16.8	(16,	15.2	(14.5,	12.6	(12,	11.3	(10.8,	6.4	(5.98,
men	(2,620)	24.4)	(3,251)	17.8)	(3,390)	16.1)	(4,253)	13.3)	(4,995)	12)	(3,165)	6.98)
Cis-straight	31.2	(29.7,	27	(26,	21.6	(20.8,	15.3	(14.7,	12.5	(12,	9.9	(9.46,
women	(2,951)	32.8)	(5,828)	28)	(6,257)	22.5)	(6,646)	16.1)	(7,539)	13.1)	(7,616)	10.5)
Cis-gay men	20.3	(14.3,	12.9	(9.08,	10.1	(7.08,	11.9	(9.28,	7.8	(5.46,	7.9	(5.01,
	(73)	28.1)	(67)	18.2)	(70)	14.5)	(129)	15.2)	(91)	11.2)	(59)	12.4)
Cis-lesbian	34.3	(23.6,	22.3	(16.6,	18.1	(12.4,	13.6	(10.1,	8.8	(5.49,	7.5	(4.02,
women	(67)	47.1)	(104)	29.4)	(81)	25.8)	(100)	18.2)	(61)	13.8)	(31)	13.7)
Cis-bisexual	19.9	(15,	21.6	(16.1,	31.8	(21.2,	17.8	(13.2,	16.6	(10.6,	9.4	(4.79,
men	(106))	26)	(104)	28.4)	(57)	44.8)	(88)	23.7)	(75)	25.2)	(46)	17.8)
Cis-bisexual	37.3	(32.7,	30.9	(26.9,	29.1	(23.5,	19.4	(14.8,	12.4	(8.53,	9.5	(5.06,
women	(345)	42.2)	(433)	35.4)	(223)	35.5)	(143)	25.2)	(94)	17.9)	(47)	17.4)
Transgender	35.6	(26.6,	35.6	(26.7,	42.5	(32.4,	22.3	(15.8,	25.1	(15.4,	14.8	(9.67,
	(70)	45.8)	(93)	45.8)	(81)	53.4)	(89)	30.7)	(112)	38.2)	(75)	22.3)

## Supplemental Table 4. Poverty rates and 95% confidence intervals of states that included the SOGI module comparing LGBT and cisgender straight people

	POVERTY RA	POVERTY RATE BY STATE									
STATES THAT INCLUDED	STRAIGHT			LGBT							
THE SOGI MODULE											
California	22.8%	(21.9, 23.7)	2945	22.5%	(18.7, 26.8)	147					
Colorado	11.0%	(9.96, 12.1)	808	17.9%	(11.3, 27.1)	41					
Connecticut	10.1%	(9.45, 10,7)	1,637	17.8%	(14, 22.3)	97					
Delaware	13.0%	(12, 14.1)	1,103	15.0%	(10.7, 20.6)	53					
Florida	10.8%	(9.05, 12.8)	570	6.9%	(2.36, 18.8)	19					
Georgia	18.4%	(17.1, 19.8)	1,050	21.8%	(15.7, 29.6)	51					
Hawaii	16.7%	(16, 17.5)	3,318	24.4%	(20.6, 28.6)	212					
Idaho	13.5%	(12.6, 14.4)	1,383	28.1%	(21.1, 36.3)	66					
Illinois	14.1%	(13.3, 15.1)	1,233	25.0%	(20, 30.8)	83					
Indiana	15.1%	(14.5, 15.8)	3,334	28.5%	(24, 33.4)	203					
Iowa	10.5%	(9.8, 11.3)	1,404	24.2%	(18.5, 30.8)	75					
Kansas	11.9%	(11.4, 12.5)	2,197	23.7%	(19.5, 28.5)	119					

	POVERTY RA	ATE BY STATE				
STATES THAT INCLUDED	STRAIGHT			LGBT		
THE SOGI MODULE						
Kentucky	17.7%	(16.7, 18.8)	2,163	28.3%	(22.4, 35.1)	107
Louisiana	21.2%	(20.1, 22.4)	2,051	30.1%	(23.5, 37.7)	78
Massachusetts	9.4%	(8.7, 10.2)	1,160	12.8%	(9.5, 16.9)	92
Maryland	11.6%	(10.4, 12.8)	1,121	22.7%	(15.7, 31.8)	66
Minnesota	8.8%	(8.5, 9.2)	2,772	16.0%	(13.4, 18.9)	174
Mississippi	23.2%	(21.7, 24.7)	1,371	29.3%	(20.3, 40.2)	34
Missouri	13.3%	(12.3, 14.4)	1,114	22.2%	(14, 33.3)	44
Montana	14.7%	(13.7, 15.8)	1,248	31.3%	(23.6, 40.2)	58
Nevada	18.8%	(17.5, 20.2)	1,158	22.6%	(17.3, 29)	81
New York	16.3%	(15.7, 17)	5,162	20.2%	(17.5, 23.3)	359
North Carolina	16.5%	(14.7, 18.5)	460	18.1%	(11.5, 27.2)	25
Ohio	13.2%	(12.5, 13.9)	3,049	21.8%	(17.3, 27.2)	140
Oklahoma	17.2%	(15.6, 18.8)	559	30.7%	(21, 42.4)	28
Pennsylvania	12.0%	(11.4, 12.7)	2,136	17.6%	(14.1, 21.7)	112
Rhode Island	12.9%	(11.8, 14.2)	764	20.8%	(15, 28.1)	57
South Carolina	17.5%	(16.2, 18.8)	1,078	19.6%	(13, 28.6)	37
Texas	21.1%	(20, 22.3)	3,438	28.1%	(22, 35)	164
Vermont	9.8%	(9.14, 10.6)	1,147	18.3%	(14, 23.7)	87
Virginia	12.4%	(11.8, 13.1)	2,040	17.2%	(13.7, 21.4)	95
Washington	11.5%	(10.8, 12.2)	1,650	18.1%	(14.8, 21.9)	123
West Virginia	18.5%	(17.1, 20.1)	643	21.9%	(14.2, 32.3)	22
Wisconsin	8.5%	(7.9, 9.2)	1,230	15.8%	(11.1, 22)	60
Wyoming	8.7%	(7.25, 10.6)	277	26.9%	(12.7, 48.3)	13

## Supplemental Table 5. Poverty rates and 95% confidence intervals by SOGI and rural and urban residence

	CIS-STRAIGHT			LGBT	LGBT		
GEOGRAPHY							
Urban	15.5	(15.3, 15.8)	39,671	21.0	(19.7, 22.4)	2,352	
Rural	15.9	(15.5, 16.4)	18,203	26.1	(23.2, 29.3)	824	

	URBAN			RURAL		
SOGI						N
Cis-straight men	13.4	(13.0, 13.7)	14,891	13.2	(12.6, 13.8)	6,524
Cis-straight women	17.6	(17.3, 18.0)	24,776	18.6	(18.0, 19.3)	11,675
Cis-gay men	11.9	(10.1, 13.8)	386	13.6	(8.5, 21.1)	348
Cis-lesbian women	17.5	(14.4, 21.0)	331	19.5	(13.8, 26.9)	103
Cis-bisexual men	19.1	(16.1, 22.5)	98	24.5	(17.6, 33.0)	121
Cis-bisexual women	28.3	(25.8, 30.9)	928	37.0	(31.5, 43.0)	344
Transgender	29.5	(25.2, 34.1)	358	27.6	(21.1, 35.1)	158

# Supplemental Table 6. Logistic Regression Results with expanded control variables

	WOMEN		MEN		
OUTCOME: EXPERIENCING POVERTY	MODEL 1	MODEL 2	MODEL 3	MODEL 4	
	ODDS RATIO	ODDS RATIO	ODDS RATIO	ODDS RATIO	
SOGI (ref: cis-straight)					
LGBT	1.11*		1.15**		
Lesbian/Gay		0.98		0.95	
Bisexual		1.11g		1.05	
Transgender		1.27*		1.65***	
Unknown	1.57***	1.57***	1.70***	1.71***	
Age (ref: 18-24)					
25-34	1.15**	1.15***	1.09	1.09	
35-44	0.87**	0.87**	0.91	0.91	
45-54	0.68***	0.68***	0.76***	0.76***	
55-64	0.56***	0.55***	0.61***	0.61***	
65+	0.25***	0.25***	0.24***	0.24***	
Race (ref: White)					
Black	2.21***	2.21***	2.38***	2.37***	
Hispanic	2.11***	2.11***	2.20***	2.21***	
American Indian or Alaska Native	1.95***	1.95***	2.05***	2.05***	
Asian	2.13***	2.13***	2.57***	2.56***	
Native Hawaiian or Pacific Islander	3.54***	3.55***	2.18***	2.17***	
Other race	1.71***	1.71***	2.06***	2.03***	
Multiracial	1.63***	1.63***	1.72***	1.72***	
Language (ref: English)					
Language other than English	2.80***	2.79***	3.37***	3.36***	
Geography (ref: Urban)					
Rural	1.34***	1.34***	1.21***	1.21***	
Disability (ref: has no disabilities)					
Has at least one disability	1.76***	1.76***	1.72***	1.72***	
Education (ref: did not graduate HS)					

 $g\ The\ difference\ between\ bis exual\ women\ and\ cis-straight\ women\ is\ statistically\ significant\ at\ the\ 20\%\ level.$ 

	WOMEN		MEN		
OUTCOME: EXPERIENCING POVERTY	MODEL 1	MODEL 2	MODEL 3	MODEL 4	
	ODDS RATIO	ODDS RATIO	ODDS RATIO	ODDS RATIO	
graduated high school	0.51***	0.51***	0.53***	0.53***	
attended college or tech school	0.30***	0.30***	0.36***	0.36***	
graduated college or tech school	0.11***	0.11***	0.17***	0.17***	
Marital status (ref: married)					
Not partnered	3.35***	3.35***	2.22***	2.23***	
Cohabitating	2.38***	2.39***	1.89***	1.91***	
Employment (ref: employed)					
Self-employed	1.56***	1.56***	1.92***	1.93***	
Non-employed	2.61***	2.61***	4.16***	4.16***	
General health (ref: good or better					
health)					
Fair or poor health	1.75***	1.75***	1.57***	1.57***	
Child or children in household (ref: no)					
Yes	2.73***	2.73***	2.23***	2.22***	
Year (ref: 2014)					
2015	0.91**	0.91**	0.85	0.85	
2016	0.92**	0.92**	0.90**	0.90**	
2017	1.04	1.04	0.95	0.95	
_cons	0.08	0.08	0.06	0.06	

<sup>\*</sup>p < .10; \*\*p < .05; \*\*\*p < .01

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