

Supplementary Materials for

Denial of service to same-sex and interracial couples: Evidence from a national survey experiment

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Sensitivity checks and additional analyses

Strength of Support for or Opposition to Service-refusal

As noted in the main text, our analyses focus on the question about whether the respondent supported or opposed service-refusal. In additional analyses, we used a follow-up question on the strength of the respondents' support or opposition to construct a four-category outcome measure. These analyses yielded substantively equivalent patterns regarding the experimental manipulations (see table S7). Assumption tests, fit statistics, and multinomial logistic regression analyses (which demonstrate the experimental manipulations primarily differentiated between dichotomous support or opposition and not strength of support or opposition) prefer using the original binary outcome rather than the constructed ordinal outcome. Therefore, we use the binary outcome for our analyses.

Order of Response Options

As mentioned above, response options (“allowed to refuse” and “required to provide”) were randomized so that half of respondents saw one first and the other half saw the other first. A multivariate analysis confirms that the order of these questions does not affect reported support for service-refusal. Similar regressions conducted on vignette subsamples demonstrated that response order did not affect support for service-refusal on any vignette.

Attitudes toward Refusal to Interracial Couples

The manuscript included a multivariate logistic regression table predicting attitudes on service-refusal to same-sex couples. Table S3 parallels Table 1 but predicts support for refusal to interracial couples instead of same-sex couples. The patterns are generally similar, but there are some notable differences highlighted in table S2. This table presents the effects of each of the experimental manipulations, their interactions with one another, and the link between support for marriage rights and support for service-refusal (and whether this varies by couple type). As highlighted in this table, religious reasons elicit higher support than do non-religious reasons for refusal to interracial couples, but not to same-sex couples. Moreover, respondents distinguished more between the types of business refusing services to interracial couples than to same-sex couples. Finally, attitudes toward marriage rights had a larger impact in people's views toward refusal to same-sex couples than people's views toward refusal to interracial couples.

Strength of Support for Marriage Rights

Support for marriage rights for gay or interracial couples was fielded as an ordinal measure ranging from strong support to strong opposition. Most respondents stated strong support or strong opposition to marriage rights. The regression models use a binary measure of support or opposition to marriage rights. Additional analyses including strength of support or opposition in an ordinal measure or in a series of binary measures yielded substantively equivalent results.

Sociodemographic and Attitudinal Factors

Random assignment of respondents to each experimental condition means that sociodemographic and other characteristics should not influence the experimental patterns. We include key sociodemographic measures in the models, and, as expected due to random assignment, these sociodemographic factors do not alter the effect of the experimental manipulations on support for service-refusal.

The inclusion of the demographic controls do not alter the experimental findings, but do have independent effects on overall levels of support for refusal across vignettes. Overall, men are more likely to support refusal than women and whites are more likely to support refusal than both blacks and Latinxs. Older people, Republicans, and evangelicals are also more likely to support service-refusal than their counterparts (younger people, Independents and Democrats, and non-evangelicals). Additional analyses also examined other sociodemographic and ideological variables (see all variables listed in “Additional Measures” subsection above), and these also did not alter the experimental findings.

Controlling for a variable is not the same thing as considering whether the patterns vary by that variable. Therefore, we examined the experimental results by the following subgroups: personal views on gay marriage rights or interracial marriage rights, gender, race, age, marital status, education level, region, political party, political ideology, evangelical identity, religious affiliation, religious attendance, those with a gay friend or relative, and sexual orientation (see tables S1 and S4-6). Overall levels of support for refusal vary substantially by subgroup, but the experimental manipulations generally have similar effects across groups with a few exceptions for the couple type and business type manipulations. For example, the religious vs. non-religious reason for refusal manipulation has the same (non-)effects across groups.

Several groups distinguish between couple-type more than their counterparts, however. Republicans, for example, distinguish more between couple types and were more likely to support refusal to gay couples than were Independents and Democrats (see table S4). Self-identified political conservatives, evangelicals, the religiously affiliated, individuals who frequently attend religious service, and individuals who report no gay friends or relatives show a similar pattern to that of Republicans.

Blacks are more likely than non-blacks to distinguish between the type of business refusing services, as they are less likely to support a corporation that refuses services (see table S6). This interaction between black and business type is significant among just the same-sex couple conditions, but is not significant among just the interracial couple conditions.

table S1. Proportion who supports business service refusal by respondents' attitudes on marriage rights for gay couples or interracial couples. This table presents mean support for business service refusal by opposition to or support of marriage rights for gay marriage if the respondent viewed a gay couple vignette and for interracial marriage if the respondent viewed an interracial couple vignette. Superscripts indicate the vignette numbers for which levels of support are significantly different ($p > .05$) among those with a particular view on marriage rights. Significance was tested using a series of dichotomous variables for the eight vignettes in logistic regression models predicting support for service-refusal.

Couple refused services: Business refusing services:		Gay Couple			
		Self-Employed Photographer		Corporation	
Reason for refusal:		Religious	Non- Religious	Religious	Non- Religious
		Vignette 1	Vignette 2	Vignette 3	Vignette 4
Ideological Group	N				
<i>Full Sample</i>	1,033	.63 ³⁴⁶⁷⁸	.68 ³⁴⁵⁶⁷⁸	.40 ¹²⁵⁶⁷⁸	.39 ¹²⁵⁶⁷⁸
<i>Binary Views on Gay Marriage Rights</i>					
Oppose Marriage Rights	398	.87 ³⁴⁶⁷⁸	.93 ³⁴⁶⁷⁸	.68 ¹²	.68 ¹²
Support Marriage Rights	635	.50 ³⁴⁷⁸	.51 ³⁴⁷⁸	.21 ¹²⁵⁶	.21 ¹²⁵⁶
<i>Ordinal Views on Gay Marriage Rights</i>					
Strongly Oppose Marriage Rights	272	.94 ³⁴⁷⁸	.94 ³⁴⁷⁸	.75 ¹²⁷	.80 ¹²⁷
Somewhat Oppose Marriage Rights	126	.73 ⁴	.90 ³⁴⁶⁸	.52 ²⁵	.44 ¹²⁵
Somewhat Support Marriage Rights	248	.70 ³⁴⁷⁸	.71 ³⁴⁷⁸	.37 ¹²⁵⁶	.21 ¹²⁵⁶
Strongly Support Marriage Rights	387	.38 ³⁴⁵⁷⁸	.39 ³⁴⁵⁷⁸	.09 ¹²⁴⁵⁶⁷	.22 ¹²³⁵⁶
Couple refused services: Business refusing services:		Interracial Couple			
Reason for refusal:		Self-Employed Photographer		Corporation	
		Religious	Non- Religious	Religious	Non- Religious
Ideological Group		Vignette 5	Vignette 6	Vignette 7	Vignette 8
		N			
<i>Full Sample</i>	1,002	.59 ²³⁴⁷⁸	.52 ¹²³⁴⁷⁸	.25 ¹²³⁴⁵⁶	.19 ¹²³⁴⁵⁶
<i>Binary Views on Interracial Marriage Rights</i>					
Oppose Marriage Rights	105	.86 ⁷⁸	.66 ¹²	.55 ¹²⁵	.58 ¹²⁵
Support Marriage Rights	897	.56 ³⁴⁷⁸	.50 ³⁴⁷⁸	.23 ¹²⁵⁶⁸	.15 ¹²⁵⁶⁷
<i>Ordinal Views on Interracial Marriage Rights</i>					
Strongly Oppose Marriage Rights	45	.82 ⁷	.80 ⁷	.25 ¹²³⁴⁵⁶⁸	.73 ¹²⁷
Somewhat Oppose Marriage Rights	60	.91 ³⁴⁸	.55 ²	.71	.47 ²⁵
Somewhat Support Marriage Rights	172	.57 ³⁴⁷⁸	.63 ³⁴⁷⁸	.23 ¹²⁵⁶	.21 ¹²⁵⁶
Strongly Support Marriage Rights	725	.56 ¹²³⁴⁷⁸	.47 ³⁴⁷⁸	.22 ¹²³⁵⁶⁸	.14 ¹²⁵⁶⁷

table S2. Effects of experimental manipulations and marriage rights on support for service refusal including both same-sex and interracial couple conditions. This logistic regression table examines the effects of experimental vignette manipulations on support for business service refusal (1) vs. opposition (0). Opposition to marriage rights item is for gay marriage if the respondent viewed a gay couple vignette and for interracial marriage if the respondent viewed an interracial couple vignette (0=support marriage; 1=oppose marriage). A three-way interaction between the experimental manipulations is not significant and thus not included in these models. Standard errors in parentheses. * $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$.

Explanatory Variable	Model 1	Model 2	Model 3	Model 4
Religious Reason	0.097 (0.094)	-0.005 (0.160)	-0.036 (0.175)	-0.044 (0.178)
Self-Employed Photographer	1.254*** (0.095)	1.141*** (0.161)	-1.371*** (0.177)	-1.427*** (0.182)
Interracial Couple	-0.602*** (0.095)	-1.023*** (0.173)	-0.494** (0.188)	-0.301 (0.202)
Religious Reason X Self-Employed Photographer		-0.145 (0.190)	-0.091 (0.203)	-0.082 (0.203)
Religious Reason X Interracial Couple		0.391* (0.190)	0.476* (0.202)	0.452* (0.202)
Self-Employed Photographer X Interracial Couple		0.411* (0.191)	0.230 (0.204)	0.127 (0.209)
Oppose Marriage Rights			1.893*** (0.134)	2.118*** (0.162)
Oppose Marriage Rights X Interracial Couple				-0.750** (0.284)
Constant	-0.568	-0.425	-1.225	-1.325
N	2,035	2,035	2,035	2,035
McFadden's R ²	0.080	0.084	0.169	0.171

table S3. Effects of experimental manipulations and other factors on support for service refusal to interracial couples. This table uses multivariate logistic regression models to examine the effects of experimental vignette manipulations and other factors on support for business service refusal (1) versus opposition (0). An interaction between the experimental manipulations is not significant and is not included. Standard errors in parentheses. * $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$.

	Model 1	Model 2	Model 3
<i>Experimental Manipulations</i>			
Religious Reason for Refusal	0.300* (0.143)	0.307* (0.147)	0.355* (0.149)
Self-Employed Photographer	1.574*** (0.147)	1.623*** (0.152)	1.643*** (0.155)
<i>Sociodemographic Factors</i>			
Female	-0.542*** (0.145)	-0.513** (0.150)	-0.490** (0.152)
LGB	-0.665 (0.382)	-0.311 (0.391)	-0.278 (0.394)
Black	-0.492 (0.261)	-0.371 (0.272)	-0.330 (0.278)
Latinx	-0.391 (0.248)	-0.304 (0.255)	-0.293 (0.255)
Other	-0.034 (0.265)	0.045 (0.271)	0.077 (0.271)
Age (In Decades)	0.110* (0.046)	0.092 (0.048)	0.092 (0.049)
Some College	0.497** (0.179)	0.560** (0.184)	0.608** (0.188)
Bachelor's Degree	0.509* (0.202)	0.592** (0.208)	0.698** (0.212)
Graduate Degree	-0.352 (0.237)	-0.209 (0.244)	-0.084 (0.248)
Married	0.266 (0.155)	0.205 (0.160)	0.194 (0.162)
Children in Household	0.072 (0.183)	0.051 (0.189)	0.100 (0.192)
Northeast	-0.084 (0.228)	0.008 (0.233)	-0.043 (0.236)
Midwest	0.184 (0.218)	0.167 (0.223)	0.095 (0.226)
South	0.155 (0.196)	0.064 (0.201)	0.001 (0.203)
Metropolitan Status	0.067 (0.194)	0.178 (0.200)	0.132 (0.204)
<i>Political and Religious Factors</i>			
Seven-Point Scale of Political Views, Conservative Higher		0.290*** (0.055)	0.266*** (0.056)
Religiously Affiliated, Non-Evangelical		-0.274 (0.213)	-0.253 (0.215)
Religiously Affiliated, Evangelical		0.204 (0.255)	0.179 (0.258)
Attend Religious Services Weekly		0.074 (0.175)	0.053 (0.177)
<i>Marriage Views</i>			
Oppose Interracial Marriage Rights			1.151*** (0.250)
Constant	-2.121	-3.352	-3.405
<i>N</i>	1002	1002	1002
McFadden's R ²	0.137	0.170	0.187

table S4. Effects of manipulations by political affiliation, political ideology, evangelical identity, religious affiliation, frequency of religious service attendance, and gay contact.

Results of logistic regression models predicting support for business service refusal (1) vs. opposition to refusal (0). Republicans, conservatives, evangelicals, the religiously affiliated, more frequent religious service attenders, and those with no gay friends or relatives distinguish more between couple types than do their counterparts. All models control for gender, race, age, and education. Standard errors in parentheses. * $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$.

Explanatory Variable	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
Religious Reason	0.108 (0.113)	0.185 (0.123)	0.066 (0.114)	0.294 (0.232)	0.190 (0.201)	0.017 (0.120)
Interracial Couple	-0.529*** (0.113)	-0.499*** (0.123)	-0.462*** (0.115)	0.192 (0.231)	0.078 (0.201)	-0.471*** (0.121)
Self-Employed Photographer	1.304*** (0.115)	1.360*** (0.125)	1.376*** (0.116)	1.227*** (0.239)	1.264*** (0.203)	1.223*** (0.122)
<i>Republican Interactions</i>						
Republican	1.164*** (0.219)					
Religious Reason X Republican	0.152 (0.232)					
Interracial Couple X Republican	-0.485* (0.234)					
Self-Employed X Republican	0.349 (0.240)					
<i>Conservative Interactions</i>						
Conservative		1.457*** (0.206)				
Religious Reason X Conservative		-0.105 (0.209)				
Interracial Couple X Conservative		-0.459* (0.211)				
Self-Employed X Conservative		-0.060 (0.212)				
<i>Evangelical Interactions</i>						
Evangelical			1.266*** (0.217)			
Religious Reason X Evangelical			0.107 (0.222)			
Interracial Couple X Evangelical			-0.630** (0.224)			
Self-Employed X Evangelical			-0.139 (0.225)			
<i>Religious Affiliation Interactions</i>						
Religiously Affiliated				1.139*** (0.272)		
Religious Reason X Religiously Affiliated				-0.232 (0.255)		
Interracial Couple X Religiously Affiliated				-0.995*** (0.255)		
Self-Employed X Religiously Affiliated				0.097 (0.261)		
<i>Frequency of Religious Service Attendance Interactions</i>						
Religious Attendance					0.336*** (0.057)	
Religious Reason X Religious Attendance					-0.024 (0.056)	
Interracial Couple X Religious Attendance					-0.226*** (0.057)	
Self-Employed X Religious Attendance					0.027 (0.057)	
<i>No Gay Friends or Relatives Interactions</i>						
No Gay Friends or Relatives						0.390* (0.198)
Religious Reason X No Gay Friends or Relatives						0.219 (0.202)
Interracial Couple X No Gay Friends or Relatives						-0.469* (0.204)
Self-Employed X No Gay Friends or Relatives						0.262 (0.204)
Constant	-1.378	-1.392	-1.280	-1.757	-1.812	-1.109
N	2,035	2,026	2,029	2,034	2,033	2,025
McFadden's R ²	0.142	0.148	0.132	0.117	0.132	0.113

table S5. Proportion who supports business service refusal by subgroups. This table presents mean levels of support for business service refusal by sociodemographic and ideological subgroups. Superscripts indicate the vignette numbers for which levels of support are significantly different ($p < .05$). Significance was tested using a series of dichotomous variables for the eight vignettes in logistic regression models predicting support for service-refusal.

Couple refused services: Business refusing services:		Gay Couple				Interracial Couple			
		Self-Employed Photographer		Corporation		Self-Employed Photographer		Corporation	
Reason for refusal:		Religious	Non- Religious	Religious	Non- Religious	Religious	Non- Religious	Religious	Non- Religious
Group	N	Vignette 1	Vignette 2	Vignette 3	Vignette 4	Vignette 5	Vignette 6	Vignette 7	Vignette 8
Full Sample	2,035	.63 ³⁴⁶⁷⁸	.68 ³⁴⁵⁶⁷⁸	.40 ¹²⁵⁶⁷⁸	.39 ¹²⁵⁶⁷⁸	.59 ²³⁴⁷⁸	.52 ¹²³⁴⁷⁸	.25 ¹²³⁴⁵⁶	.19 ¹²³⁴⁵⁶
<i>Gender</i>									
Female	1,054	.62 ³⁴⁶⁷⁸	.62 ³⁴⁶⁷⁸	.40 ¹²⁵⁷⁸	.32 ¹²⁵⁶⁷⁸	.55 ³⁴⁷⁸	.44 ¹²⁴⁷⁸	.20 ¹²³⁴⁵⁶	.17 ¹²³⁴⁵⁶
Male	981	.65 ³⁴⁷⁸	.73 ³⁴⁶⁷⁸	.39 ¹²⁵⁶⁸	.48 ¹²⁵⁶⁷⁸	.64 ³⁴⁷⁸	.60 ²³⁴⁷⁸	.31 ¹²⁴⁵⁶	.22 ¹²³⁴⁵⁶
<i>Race</i>									
White	1,437	.65 ³⁴⁷⁸	.67 ³⁴⁶⁷⁸	.42 ¹²⁵⁶⁷⁸	.46 ¹²⁵⁷⁸	.63 ³⁴⁷⁸	.56 ²³⁷⁸	.27 ¹²³⁴⁵⁶	.20 ¹²³⁴⁵⁶
Black	179	.54 ³⁴⁷⁸	.77 ³⁴⁷⁸	.19 ¹²⁵⁶	.13 ¹²⁵⁶	.50 ³⁴⁷⁸	.50 ³⁴⁷⁸	.08 ¹²⁵⁶	.10 ¹²⁵⁶
Latinx	252	.53 ⁷⁸	.61 ⁴⁷⁸	.46 ⁷⁸	.32 ²	.38	.42 ⁷	.19 ¹²³⁶	.21 ¹²³
Other/Multi-Race	167	.70 ³⁴⁶⁸	.74 ³⁴⁶⁷⁸	.38 ¹²	.19 ¹²⁵	.63 ⁴⁸	.35 ¹²	.41 ²	.18 ¹²⁵
<i>Age</i>									
18-29	349	.43 ⁷⁸	.63 ³⁴⁷⁸	.36 ²⁸	.24 ²⁵⁶	.46 ⁴⁷⁸	.51 ⁴⁷⁸	.17 ¹²⁵⁶	.11 ¹²³⁵⁶
30-44	455	.61 ³⁴⁷⁸	.67 ³⁴⁶⁷⁸	.29 ¹²⁵	.40 ¹²⁷⁸	.53 ³⁷⁸	.44 ²⁷⁸	.21 ¹²⁴⁵⁶	.17 ¹²⁴⁵⁶
45-59	570	.70 ³⁴⁷⁸	.62 ³⁴⁷⁸	.41 ¹²⁵⁸	.34 ¹²⁵⁶	.62 ³⁴⁷⁸	.55 ⁴⁷⁸	.29 ¹²⁵⁶	.22 ¹²³⁵⁶
60+	661	.70 ³⁴⁶⁷⁸	.74 ³⁴⁶⁷⁸	.51 ¹²⁵⁷⁸	.51 ¹²⁵⁷⁸	.67 ³⁴⁷⁸	.55 ¹²⁷⁸	.28 ¹²³⁴⁵⁶	.23 ¹²³⁴⁵⁶
<i>Marital Status</i>									
Married	1,136	.67 ³⁴⁷⁸	.67 ³⁴⁷⁸	.46 ¹²⁵⁶⁷⁸	.46 ¹²⁵⁶⁷⁸	.64 ³⁴⁷⁸	.61 ³⁴⁷⁸	.26 ¹²³⁴⁵⁶	.24 ¹²³⁴⁵⁶
Not Married	899	.59 ³⁴⁶⁷⁸	.68 ³⁴⁵⁶⁷⁸	.30 ¹²⁵⁸	.29 ¹²⁵⁶⁸	.53 ²³⁴⁷⁸	.42 ¹²⁴⁷⁸	.25 ¹²⁵⁶⁸	.14 ¹²³⁴⁵⁶⁷
<i>Education</i>									
Bachelor's Degree+	653	.64 ³⁴⁷⁸	.62 ³⁴⁷⁸	.32 ¹²⁵⁶	.33 ¹²⁵⁶	.56 ³⁴⁷⁸	.51 ³⁴⁷⁸	.25 ¹²⁵⁶	.24 ¹²⁵⁶
<Bachelor's Degree	1,382	.63 ³⁴⁷⁸	.70 ³⁴⁶⁷⁸	.44 ¹²⁵⁷⁸	.42 ¹²⁵⁶⁷⁸	.60 ³⁴⁷⁸	.53 ²⁴⁷⁸	.25 ¹²³⁴⁵⁶	.17 ¹²³⁴⁵⁶
<i>Region</i>									
Northeast	377	.60 ³⁴⁷⁸	.70 ³⁴⁶⁷⁸	.22 ¹²⁵⁶	.31 ¹²⁵	.51 ³⁴⁷⁸	.44 ²³⁸	.26 ¹²⁵	.19 ¹²⁵⁶
Midwest	467	.66 ³⁴⁷⁸	.58 ³⁴⁷⁸	.37 ¹²⁵⁶⁸	.38 ¹²⁵⁶⁸	.66 ³⁴⁷⁸	.64 ³⁴⁷⁸	.22 ¹²⁵⁶	.20 ¹²³⁴⁵⁶
South	727	.66 ³⁴⁶⁷⁸	.68 ³⁴⁶⁷⁸	.47 ¹²⁷⁸	.43 ¹²⁵⁷⁸	.61 ⁴⁷⁸	.48 ¹²⁷⁸	.28 ¹²³⁴⁵⁶	.22 ¹²³⁴⁵⁶
West	464	.60 ⁴⁷⁸	.76 ³⁴⁵⁶⁷⁸	.47 ²⁷⁸	.41 ¹²⁸	.55 ²⁷⁸	.54 ²⁷⁸	.25 ¹²³⁵⁶	.14 ¹²³⁴⁵⁶

<i>Metropolitan Status</i>									
Metropolitan	1,706	.61 ³⁴⁷⁸	.68 ³⁴⁵⁶⁷⁸	.38 ¹²⁵⁶⁷⁸	.36 ¹²⁵⁶⁷⁸	.58 ²³⁴⁷⁸	.53 ²³⁴⁷⁸	.25 ¹²³⁴⁵⁶	.19 ¹²³⁴⁵⁶
Not Metropolitan	329	.76 ³⁶⁷⁸	.68 ⁷⁸	.50 ¹⁷⁸	.57 ⁷⁸	.64 ⁷⁸	.50 ¹⁷⁸	.27 ¹²³⁴⁵⁶	.22 ¹²³⁴⁵⁶
<i>Political Party</i>									
Republican	524	.90 ³⁴⁶⁷⁸	.86 ³⁴⁶⁷⁸	.59 ¹²⁵⁷⁸	.62 ¹²⁵⁷⁸	.80 ³⁴⁷⁸	.67 ¹²⁷⁸	.39 ¹²³⁴⁵⁶	.33 ¹²³⁴⁵⁶
Independent	840	.69 ³⁴⁶⁷⁸	.63 ³⁴⁷⁸	.44 ¹²⁵⁷⁸	.36 ¹²⁵⁶⁸	.59 ³⁴⁷⁸	.51 ¹⁴⁷⁸	.28 ¹²³⁵⁶	.19 ¹²³⁴⁵⁶
Democrat	671	.40 ²³⁴⁷⁸	.56 ¹³⁴⁷⁸	.21 ¹²⁵⁶⁸	.22 ¹²⁵⁶⁸	.43 ³⁴⁷⁸	.43 ³⁴⁷⁸	.11 ¹²⁵⁶	.09 ¹²³⁴⁵⁶
<i>Political Orientation</i>									
Conservative	707	.79 ³⁴⁶⁷⁸	.89 ³⁴⁵⁶⁷⁸	.62 ¹²⁷⁸	.60 ¹²⁵⁷⁸	.74 ²⁴⁷⁸	.65 ¹²⁷⁸	.40 ¹²³⁴⁵⁶	.34 ¹²³⁴⁵⁶
Moderate	769	.64 ³⁴⁶⁷⁸	.59 ³⁴⁷⁸	.38 ¹²⁵⁷⁸	.26 ¹²⁵⁶	.53 ³⁴⁷⁸	.47 ¹⁴⁷⁸	.22 ¹²³⁵⁶	.16 ¹²³⁵⁶
Liberal	550	.45 ³⁴⁷⁸	.46 ³⁴⁷⁸	.21 ¹²⁵⁶⁸	.28 ¹²⁵⁷⁸	.48 ³⁴⁷⁸	.41 ³⁷⁸	.10 ¹²⁴⁵⁶	.09 ¹²³⁴⁵⁶
<i>Religious Identity</i>									
Self-Identified Evangelical	552	.80 ³⁴⁶⁷⁸	.85 ³⁴⁵⁶⁷⁸	.61 ¹²⁷⁸	.57 ¹²⁷⁸	.68 ²⁷⁸	.57 ¹²⁷⁸	.37 ¹²³⁴⁵⁶	.31 ¹²³⁴⁵⁶
Not Evangelical	1,477	.58 ³⁴⁷⁸	.61 ³⁴⁶⁷⁸	.30 ¹²⁵⁶⁸	.33 ¹²⁵⁶⁷⁸	.55 ³⁴⁷⁸	.51 ²³⁴⁷⁸	.22 ¹²⁴⁵⁶	.15 ¹²³⁴⁵⁶
<i>Religious Affiliation</i>									
Religiously Affiliated	1,665	.70 ³⁴⁵⁶⁷⁸	.71 ³⁴⁵⁶⁷⁸	.42 ¹²⁵⁶⁷⁸	.44 ¹²⁵⁷⁸	.59 ¹²³⁴⁷⁸	.54 ¹²³⁷⁸	.25 ¹²³⁴⁵⁶	.21 ¹²³⁴⁵⁶
Not Religiously Affiliated	369	.37 ⁴⁵⁸	.50 ³⁴⁷⁸	.29 ²⁵	.18 ¹²⁵⁶	.58 ¹³⁴⁷⁸	.44 ⁴⁸	.26 ²⁵	.13 ¹²⁵⁶
<i>Religious Service Attendance</i>									
Weekly or More	660	.86 ³⁴⁵⁶⁷⁸	.83 ³⁴⁵⁶⁷⁸	.56 ¹²⁷⁸	.54 ¹²⁷⁸	.53 ¹²⁷⁸	.60 ¹²⁷⁸	.30 ¹²³⁴⁵⁶	.26 ¹²³⁴⁵⁶
Sometimes	869	.58 ³⁴⁷⁸	.57 ³⁴⁷⁸	.33 ¹²⁵⁷⁸	.35 ¹²⁵⁷⁸	.56 ³⁴⁷⁸	.46 ⁷⁸	.21 ¹²³⁴⁵⁶	.21 ¹²³⁴⁵⁶
Never	504	.47 ³⁴⁷⁸	.63 ³⁴⁷⁸	.27 ¹²⁵⁶⁸	.28 ¹²⁵⁶⁸	.59 ³⁴⁷⁸	.52 ³⁴⁷⁸	.27 ¹²⁵⁶⁸	.11 ¹²³⁴⁵⁶⁷
<i>Gay Contact</i>									
Gay Friend or Relative	1,284	.58 ³⁴⁷⁸	.62 ³⁴⁶⁷⁸	.35 ¹²⁵⁶⁷⁸	.34 ¹²⁵⁶⁷⁸	.54 ³⁴⁷⁸	.52 ²³⁴⁷⁸	.22 ¹²³⁴⁵⁶	.21 ¹²³⁴⁵⁶
No Gay Friend or Relative	741	.74 ³⁴⁶⁷⁸	.80 ³⁴⁶⁷⁸	.47 ¹²⁵⁷⁸	.48 ¹²⁵⁷⁸	.68 ³⁴⁶⁷⁸	.53 ¹²⁵⁷⁸	.30 ¹²³⁴⁵⁶	.18 ¹²³⁴⁵⁶
<i>Sexual Orientation</i>									
Respondent is LGB	117	.20	.47 ⁷⁸	.17 ⁵	.23	.54 ³⁷⁸	.42 ⁸	.12 ²⁵	.00 ²⁵⁶
Respondent is Heterosexual	1,902	.66 ³⁴⁶⁷⁸	.70 ³⁴⁵⁶⁷⁸	.42 ¹²⁵⁶⁷⁸	.40 ¹²⁵⁶⁷⁸	.59 ²³⁴⁷⁸	.52 ¹²³⁴⁷⁸	.26 ¹²³⁴⁵⁶	.21 ¹²³⁴⁵⁶

table S6. Effects of experimental manipulations by race. Results of logistic regression models predicting support for business service refusal (1) vs. opposition to refusal (0). This table demonstrates that the business type manipulation has a larger effect on blacks than other racial groups. This pattern in the full sample is driven by black respondents being less likely to support corporations refusing services to gay couples. Models control for gender, age, and education. Standard errors in parentheses. * $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$.

Explanatory Variable	Full Sample	Gay Couple	Interracial Couple
Religious Reason	0.083 (0.113)	-0.125 (0.155)	0.334* (0.167)
Interracial Couple	-0.605*** (0.113)	— —	— —
Self-Employed Photographer	1.240*** (0.114)	0.930*** (0.156)	1.610*** (0.170)
Black	-1.107** (0.399)	-1.329** (0.487)	-0.933 (0.607)
Latinx	0.035 (0.288)	-0.255 (0.341)	0.150 (0.402)
Other	-0.556 (0.373)	-0.818 (0.459)	-0.069 (0.484)
Religious Reason X Black	-0.222 (0.386)	-0.145 (0.567)	-0.360 (0.530)
Religious Reason X Latinx	-0.115 (0.295)	0.230 (0.392)	-0.560 (0.452)
Religious Reason X Other	0.693 (0.361)	0.513 (0.518)	0.793 (0.519)
Interracial Couple X Black	-0.107 (0.397)		
Interracial Couple X Latinx	-0.261 (0.298)		
Interracial Couple X Other	0.134 (0.359)		
Self-Employed X Black	1.155** (0.416)	1.463** (0.563)	0.796 (0.622)
Self-Employed X Latinx	-0.346 (0.295)	-0.105 (0.392)	-0.623 (0.453)
Self-Employed X Other	0.057 (0.362)	0.818 (0.516)	-0.742 (0.520)
Constant	-0.910	-0.812	-1.661
N	2,035	1,033	1,002
McFadden's R ²	0.110	0.089	0.123

table S7. Effects of experimental manipulations and other factors on an ordinal measure of strength of support for service refusal to same-sex couples. This table presents ordinal logistic regression results (strongly oppose refusal=1 to strongly support refusal=4) that parallel the binary logistic regression results we present in Table 1. An interaction between the experimental manipulations is not significant and is not included. Standard errors in parentheses. * $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$.

	Model 1	Model 2	Model 3
<i>Experimental Manipulations</i>			
Religious Reason for Refusal	0.031 (0.118)	0.115 (0.124)	0.112 (0.128)
Self-Employed Photographer	0.932*** (0.137)	1.047*** (0.127)	1.178*** (0.132)
<i>Sociodemographic Factors</i>			
Female	-0.383** (0.119)	-0.434*** (0.126)	-0.359** (0.130)
LGB	-1.529*** (0.313)	-1.042*** (0.322)	-0.935** (0.333)
Black	-0.470* (0.218)	-0.415 (0.232)	-0.586* (0.240)
Latinx	-0.384* (0.191)	-0.298 (0.199)	-0.293 (0.206)
Other	-0.266 (0.220)	-0.094 (0.234)	0.136 (0.244)
Age (In Decades)	0.163*** (0.041)	0.126** (0.044)	0.098* (0.045)
Some College	-0.337* (0.148)	-0.247 (0.155)	0.049 (0.162)
Bachelor's Degree	-0.342* (0.167)	-0.317 (0.177)	-0.158 (0.185)
Graduate Degree	-0.638** (0.191)	-0.339 (0.203)	-0.015 (0.212)
Married	0.231 (0.132)	-0.055 (0.140)	-0.098 (0.145)
Children in Household	0.232 (0.155)	0.161 (0.163)	0.112 (0.169)
Northeast	-0.558** (0.189)	-0.623** (0.200)	-0.719** (0.208)
Midwest	-0.516** (0.187)	-0.602** (0.196)	-0.588** (0.203)
South	-0.056 (0.167)	-0.342 (0.176)	-0.397* (0.183)
Metropolitan Status	-0.518** (0.168)	-0.416* (0.175)	-0.256 (0.181)
<i>Political and Religious Factors</i>			
Seven-Point Scale of Political Views, Conservative Higher		0.388*** (0.048)	0.293*** (0.050)
Religiously Affiliated, Non-Evangelical		0.366* (0.183)	0.427* (0.186)
Religiously Affiliated, Evangelical		1.092*** (0.222)	0.848** (0.227)
Attend Religious Services Weekly		0.593*** (0.147)	0.271 (0.155)
<i>Marriage Views</i>			
Oppose Same-Sex Marriage Rights			1.767*** (0.153)
Constant (Cut 1)	-0.453	1.526	1.732
Constant (Cut 2)	0.60	2.106	2.377
Constant (Cut 3)	0.919	3.096	3.492
<i>N</i>	1027	1027	1027

table S8. Sample means by experimental condition. This table presents the means for key sociodemographic characteristics by vignette viewed. All variation is random and due to random selection into experimental groups.

Measures	Metric	Full Sample	Vignette 1	Vignette 2	Vignette 3	Vignette 4	Vignette 5	Vignette 6	Vignette 7	Vignette 8
Female	Female=1	.52	.49	.52	.53	.55	.54	.51	.51	.50
Race/Ethnicity										
White	White, Non-Latinx=1	.71	.74	.72	.67	.70	.74	.70	.67	.70
Black	Black, Non-Latinx=1	.09	.05	.08	.10	.09	.10	.10	.09	.08
Latinx	Latinx=1	.12	.12	.12	.14	.13	.10	.10	.15	.13
Other Race	Other or 2+ Races, Non-Latinx	.08	.09	.07	.08	.08	.07	.09	.09	.09
Age	Continuous in Decades	4.98	5.00	4.98	4.87	4.99	5.02	4.98	5.04	4.99
Bachelor's Degree		.32	.33	.32	.31	.28	.35	.33	.33	.31
N		2,035	265	259	251	258	246	251	253	252

table S9. Effects of experimental manipulations and other factors on support for service refusal to same-sex couples using survey weights. This table parallels Table 1, but uses survey weights in multivariate logistic regression models to examine the effects of experimental vignette manipulations and other factors on support for business service refusal (1) versus opposition (0). An interaction between the experimental manipulations is not significant and is not included. Standard errors in parentheses. * $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$.

	Model 1	Model 2	Model 3
<i>Experimental Manipulations</i>			
Religious Reason for Refusal	-0.014 (0.145)	0.054 (0.160)	-0.010 (0.165)
Self-Employed Photographer	1.079*** (0.149)	1.218*** (0.160)	1.376*** (0.170)
<i>Sociodemographic Factors</i>			
Female	-0.301* (0.147)	-0.395* (0.160)	-0.256 (0.167)
LGB	-1.140** (0.417)	-0.723 (0.402)	-0.534 (0.441)
Black	-0.515 (0.266)	-0.524 (0.311)	-0.790** (0.308)
Latinx	-0.224 (0.234)	-0.144 (0.249)	-0.177 (0.258)
Other	-0.303 (0.321)	-0.130 (0.337)	0.313 (0.375)
Age (In Decades)	0.186*** (0.051)	0.160*** (0.054)	0.116* (0.058)
Some College	-0.365* (0.182)	-0.267 (0.197)	0.013 (0.213)
Bachelor's Degree	-0.319 (0.204)	-0.286 (0.221)	-0.154 (0.231)
Graduate Degree	-0.562* (0.218)	-0.336 (0.238)	-0.056 (0.252)
Married	0.131 (0.160)	-0.139 (0.178)	-0.187 (0.187)
Children in Household	0.323 (0.185)	0.301 (0.201)	0.216 (0.211)
Northeast	-0.562* (0.230)	-0.589* (0.252)	-0.709** (0.269)
Midwest	-0.596** (0.219)	-0.696** (0.236)	-0.719** (0.250)
South	-0.161 (0.199)	-0.417 (0.218)	-0.556* (0.237)
Metropolitan Status	-0.541* (0.213)	-0.472* (0.224)	-0.289 (0.227)
<i>Political and Religious Factors</i>			
Seven-Point Scale of Political Views, Conservative Higher		0.297*** (0.061)	0.206** (0.063)
Religiously Affiliated, Non-Evangelical		0.266 (0.242)	0.271 (0.236)
Religiously Affiliated, Evangelical		0.921** (0.306)	0.679* (0.311)
Attend Religious Services Weekly		0.813*** (0.183)	0.492* (0.202)
<i>Marriage Views</i>			
Oppose Same-Sex Marriage Rights			1.751*** (0.196)
Constant	-0.242	-1.908	-2.049
<i>N</i>	1033	1033	1033

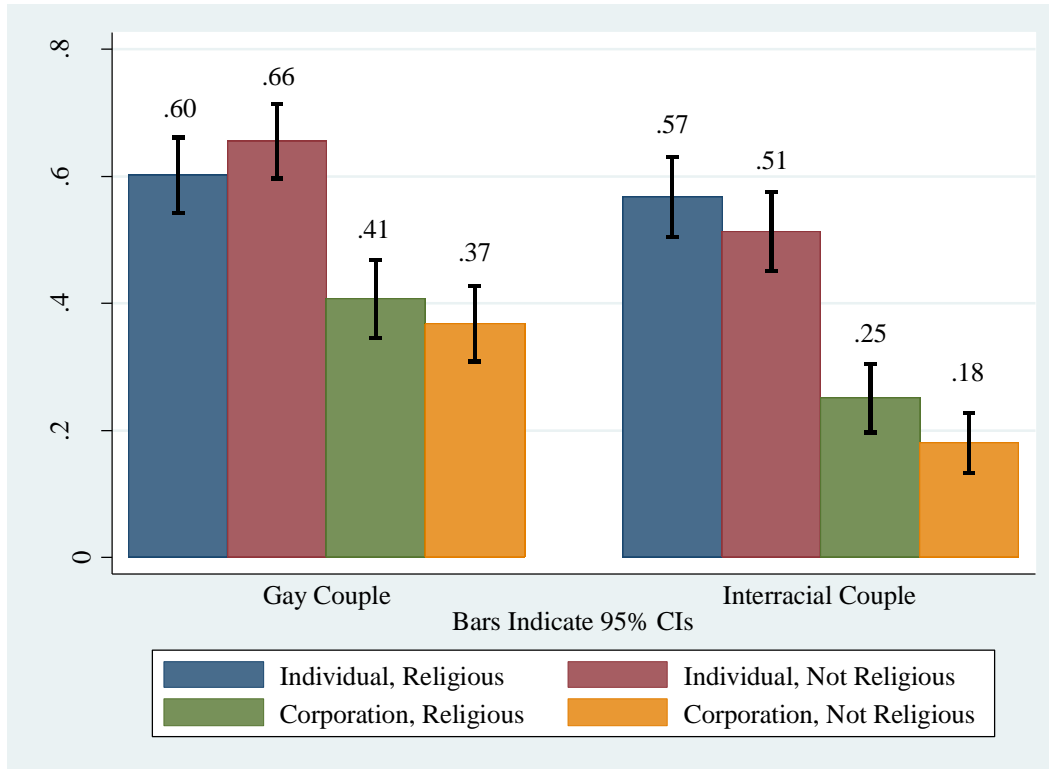


fig. S1. Support for business service refusal by vignette for weighted full sample. This figure parallels the figure in the main text (Fig. 1), but uses survey weights. The patterns remain the same for the weighted sample as in the unweighted sample. N=2,035.

appendix S1. Vignettes.

Vignette 1: gay couple/self-employed/religious refusal

Michael and Jason, a gay couple, are getting married and want to have photos taken to send out with their wedding invitations. They went to a self-employed photographer because they heard he was the best photographer in the area for engagement portraits. The photographer refused to take their picture. He explained that because he is religious, he doesn't approve of gay marriage. Michael and Jason left without pictures for their invitations.

Vignette 2: gay couple/self-employed/non-religious refusal

Michael and Jason, a gay couple, are getting married and want to have photos taken to send out with their wedding invitations. They went to a self-employed photographer because they heard he was the best photographer in the area for engagement portraits. The photographer refused to take their picture. He explained that although he is not religious, he doesn't approve of gay marriage. Michael and Jason left without pictures for their invitations.

Vignette 3: gay couple/closely held corporation/religious refusal

Michael and Jason, a gay couple, are getting married and want to have photos taken to send out with their wedding invitations. They went to a photography studio in a large chain store because they heard it was the best place in the area for engagement portraits. The photographer refused to take their picture. He explained that because the corporate chain owner is religious, the owner doesn't approve of gay marriage. Michael and Jason left without pictures for their invitations.

Vignette 4: gay couple/closely held corporation/non-religious refusal

Michael and Jason, a gay couple, are getting married and want to have photos taken to send out with their wedding invitations. They went to a photography studio in a large chain store because they heard it was the best place in the area for engagement portraits. The photographer refused to take their picture. He explained that although the corporate chain owner isn't religious, the owner doesn't approve of gay marriage. Michael and Jason left without pictures for their invitations.

Vignette 5: interracial couple/self-employed/religious refusal

Michael and Jennifer, a black man and a white woman, are getting married and want to have photos taken to send out with their wedding invitations. They went to a self-employed photographer because they heard he was the best photographer in the area for engagement portraits. The photographer refused to take their picture. He explained that because he is religious, he doesn't approve of interracial marriage. Michael and Jennifer left without pictures for their invitations.

Vignette 6: interracial couple/self-employed/non-religious refusal

Michael and Jennifer, a black man and a white woman, are getting married and want to have photos taken to send out with their wedding invitations. They went to a self-employed photographer because they heard he was the best photographer in the area for engagement portraits. The photographer refused to take their picture. He explained that although he is not religious, he doesn't approve of interracial marriage. Michael and Jennifer left without pictures for their invitations.

Vignette 7: interracial couple/closely held corporation/religious refusal

Michael and Jennifer, a black man and a white woman, are getting married and want to have photos taken to send out with their wedding invitations. They went to a photography studio in a large chain store because they heard it was the best place in the area for engagement portraits. The photographer refused to take their picture. He explained that because the corporate chain owner is religious, the owner doesn't approve of interracial marriage. Michael and Jennifer left without pictures for their invitations.

Vignette 8: interracial couple/closely held corporation/non-religious refusal

Michael and Jennifer, a black man and a white woman, are getting married and want to have photos taken to send out with their wedding invitations. They went to a photography studio in a large chain store because they heard it was the best place in the area for engagement portraits. The photographer refused to take their picture. He explained that although the corporate chain owner isn't religious, the owner doesn't approve of interracial marriage. Michael and Jennifer left without pictures for their invitations.

appendix S2. Vignette-based questions.

1. Should the PHOTOGRAPHER/CORPORATE CHAIN [insert first response]? Or, should HE/IT [insert second response]? [AT RANDOM, HALF OF THE RESPONDENTS RECEIVED ONE RESPONSE OPTION FIRST AND THE OTHER HALF RECEIVED THE OTHER FIRST]

- a. be allowed to refuse services to the couple
- b. be required to provide services to the couple as HE/IT would to all other customers

2. Do you feel strongly or not strongly that the PHOTOGRAPHER/CORPORATE CHAIN should [insert response to question 1]?

- a. Strongly
- b. Not Strongly

3. Why do you think that the PHOTOGRAPHER/CORPORATE CHAIN should [insert response to question 1]? In your own words, please write a few sentences explaining why you feel this way. [text box]

4. To what extent do you agree or disagree that GAY AND LESBIAN/INTERRACIAL couples should be allowed to marry? [RESPONDENTS RECEIVED GAY AND LESBIAN OPTION IF THE GAY COUPLE WAS DEPICTED IN THE VIGNETTE, AND RECEIVED INTERRACIAL OPTION IF THE INTERRACIAL COUPLE WAS DEPICTED]

- a. Strongly agree
- b. Somewhat agree
- c. Somewhat disagree
- d. Strongly disagree