LION POLL

CENTER FOR SURVEY RESEARCH AT PENN STATE HARRISBURG

Report of Methods

Director's Questions

April 2020

TABLE OF CONTENTS

LIST OF TABLES

INTRODUCTION

The Lion Poll is an omnibus survey conducted by the Center for Survey Research (CSR) at Penn State Harrisburg. A total of 1,051 self-administered web surveys were completed by adult Pennsylvanians between February 24 and April 7, 2020. The Lion Poll used a quota-based invitation system to produce a final dataset that is representative of Pennsylvania's population by region and, separately, by age/sex combined categories. Project activity was directed by Stephanie L. Wehnau, Director of the Center for Survey Research at Penn State Harrisburg.

The purpose of the Lion Poll is to provide timely and accurate data to agencies, organizations, and researchers with statewide interests and responsibilities. Sponsors of CSR's omnibus polls have used their results to track public policy issues; measure general attitudes, awareness, and knowledge of their organizations; and measure satisfaction with organizational services and performance.

Data Analysis Notes

The following notes should be taken into account when reviewing the final dataset:

1. Data are not weighted; however, the final dataset is representative of Pennsylvania's population by region and, separately, by age/sex combined categories.
2. Percentages may not total to 100% due to the exclusion of 'Don't know' responses.
3. See Appendix A of the report for a map and list of the Lion Poll regions.
4. See Appendix B for the sponsored survey questions and standard demographics that were used in data collection.

METHODOLOGY

Instrument Development

During January and February 2020, the CSR project team worked in consultation with the various Lion Poll sponsors to develop and refine survey questions for use in data collection.

The instrument was programmed using Qualtrics web survey software. Qualtrics' online survey platform allows for complex question patterns and automatic skipping when appropriate to create a seamless flow from one question to the next for respondents.

Respondent Recruitment

CSR utilized Marketing Systems Group (MSG) of Horsham, Pennsylvania to recruit respondents who had previously signed up to participate in a variety of web survey panels in exchange for nominal compensation. These web survey panels were constructed utilizing a double opt-in recruitment technique. In a double opt-in system, the potential respondents provide their email address to indicate interest in participating in the panel. An automated email is then sent to the email address provided to ensure that the owner of the email address is aware of the intended use. Once the email owner confirms their interest in participating, the individual becomes part of the panel. After providing information on a wide variety of demographic topics to establish a panelist profile, the panelist is eligible to participate in future surveys. A double opt-in system guarantees that all respondents have provided explicit consent to be contacted for marketing and/or research purposes in compliance with all applicable federal laws.

MSG sent emails to potential respondents that included a customized link with a respondent identifier. This link took the potential respondent directly to the web survey programmed in CSR's Qualtrics account. Upon successful completion of the survey, CSR re-directed the respondent to the appropriate panel provider via a customized link that included the unique respondent identifier. As a result of this setup, only members of the CSR project team had access to the survey results and CSR never had access to any personally identifiable information of any of the survey respondents.

Response Quality

Regular panel maintenance was performed to ensure that high-quality respondents were being utilized in the Lion Poll. First, answers to demographic questions were periodically checked to make sure that they matched with the initial panel profile established by respondents. CSR also asked screening questions in such a way that the potential respondents did not know what characteristics were required for participation. Since panelists are paid for their participation, this decreases the chance of the respondent fabricating answers to gain access to the study. CSR also embedded attention check questions and straight-lining checks into the Lion Poll to confirm that the respondent was carefully reading and responding to questions. Straight-lining is when a respondent answers all questions in a series in the same way. To check for this, one item was included in a question series in two different ways: once with positive wording and once with negative wording. If a respondent is carefully reading the questions, they will answer these questions in contrasting ways. If a respondent participated in straight-lining or answered an attention check question incorrectly, their survey was immediately terminated and their response was removed from the final dataset. In addition, CSR identifies these responses as "low-quality," and panelists are excluded from participation in future surveys after three low-quality responses. The final dataset was also checked for duplicate responses using key demographic indicators and open-ended question responses. Finally, CSR reviewed responses for other quality measures, such as survey duration (outlying surveys that were completed very quickly were removed), and applicability of open-ended responses to prevent automated (bot) responses from being included in the final dataset.

Sample Representation

Potential respondents were invited from the universe of all available panelists on the basis of the Pennsylvania county, age, and gender indicated in their panelist profile. These questions were also asked as screener questions at the beginning of the survey to guarantee that the respondent matched the expected profile. In order to ensure that the results of the Lion Poll were not biased toward any particular location, age, or sex, CSR programmed quotas into the Qualtrics web survey platform to guarantee that the final dataset would be representative of Pennsylvania's known population by region and, separately, by age/sex combined categories. Region quotas were developed by totaling Pennsylvania's population by county and then determining what proportion of the state's residents lived in the counties represented by each region.

Tables 1 and 2 display the proportions of respondents in the final dataset by age/sex category and by region. The data source used to establish quotas was the July 1, 2018 State Population Estimates, U.S. Census Bureau, Population Division. Since the final dataset was representative of Pennsylvania's population by age, sex, and region, weighting was not needed. For a map and list of the Lion Poll's regions by county, please see Appendix A.

Table 1. Final Responses by Age and Sex

	Interviewed	Census %
Male		
18-24 years	61	5.8%
25-34 years	90	8.6%
35-44 years	77	7.3%
45-54 years	84	8.0%
55-64 years	92	8.8%
65 years and over	106	10.1%
Female		
18-24 years	61	5.8%
25-34 years	86	8.2%
35-44 years	77	7.3%
45-54 years	86	8.2%
55-64 years	96	9.1%
65 years and over	135	12.8%

Table 2. Final Responses by Region

	Interviewed	Census %
Northern	74	7.0%
Central	98	9.3%
Northeast	172	16.4%
Southwest	212	20.2%
South Central	159	15.1%
Southeast	336	32.0%

It should be noted that respondents were not selected from the general population at random; rather, only respondents who opted to participate in a paid web survey panel were included in the sampling frame. In addition, as with all public opinion surveys, the results are representative only of those who chose to participate. As a result, certain biases exist that might prevent a direct comparison to Pennsylvania's general population. Namely, results may be biased against those who are less likely to participate in web survey panels (sample frame bias) or those panelists who chose

not to participate in this survey (non-response bias). In addition, although respondents who do not have access to the internet at home are less likely to sign up for web survey panels, they are not excluded from participating, and may do so through the use of public internet access, mobile phones, or internet at their place of employment. Finally, respondents received a small incentive to participate, although this is considered to be negligible in terms of overall survey bias.

To minimize these potential biases, key demographic responses were monitored and compared to Census data to ensure that the final sample was reflective of characteristics that are known to potentially bias responses. Rigorous efforts were employed to ensure that the characteristics of the respondents in the final dataset are representative of Pennsylvania's diverse population, despite the non-probability-based sampling method employed. Although the Lion Poll is considered to be a non-probability-based sampling method, the quotas utilized resulted in a final dataset that is representative of Pennsylvania's population by region, age, and sex.

Data Collection

Surveys were self-administered through Qualtrics Online Survey Platform. As mentioned previously, rigorous strategies were employed to ensure high-quality survey responses from trusted panelists. A 'soft launch' was performed where a working draft of the survey instrument was pre-tested with a small sample of respondents before full survey distribution began. The pre-test process ensured that the skipping patterns of the programmed survey instrument were functioning as intended. Pre-testing also increases the likelihood that the questions provide accurate data while decreasing the likelihood of collecting unusable data; therefore, it is an integral component of questionnaire design. The pre-test findings were reviewed, found to be error-free, and incorporated into the final dataset.

Survey responses were collected through CSR's Qualtrics web survey account between February 24 and April 7, 2020. Waves of survey invitations were sent by Marketing Systems Group to potential survey respondents based on the panelists' profile characteristics and the remaining region and age/sex quota needs. Respondents who indicated that they were at least 18 years of age and lived in Pennsylvania were deemed eligible to participate. Survey collection ended when CSR received 1,051 responses.

Data Preparation and Analysis Notes

All completed survey data were extracted from Qualtrics into Statistical Package for the Social Sciences (SPSS) software. Data were verified for accuracy of variable coding, and verbatim text was edited for consistency in formatting before final review by the senior staff of the Center for Survey Research. A survey dataset was created in SPSS for Windows version 26.0.

The following notes should be taken into account when reviewing the final dataset:

1. Data are not weighted; however, the final dataset is representative of Pennsylvania's population by region and, separately, by age/sex combined categories.
2. Percentages may not total to 100% due to the exclusion of 'Don't know' responses.
3. See Appendix A of the report for a map and list of the Lion Poll regions.
4. See Appendix B for the sponsored survey questions and standard demographics that were used in data collection.

PROJECT STATISTICS

The final dataset includes responses from 1,051 adult Pennsylvania residents. The average length of a completed survey was approximately 15 minutes. A total of 25,879 different panelists were invited to participate in the survey during data collection. The survey's participation rate was calculated using the American Association of Public Opinion Research's Response Rate 3 (RR3) formula. RR3 is obtained by dividing the number of completed interviews by the sum of the numbers of completed interviews, partially completed interviews, refusals, and non-contacts. The participation rate is then adjusted by estimating the proportion of cases of unknown eligibility based on the known proportion of eligible cases of all cases for which eligibility was determined. This is a conservative estimate that ultimately underestimates the true participation rate. AAPOR sets an industry standard for consistent reporting among survey researchers. For more information, see AAPOR's "Standard Definitions report" at http://www.aapor.org/Standards-Ethics/Standard-Definitions-(1).aspx.

The final survey participation rate was 8.6%. It should be noted that this rate estimates for eligibility based on eligibility screening criteria (i.e., age and geography) and the utilization of quotas. The rate does not estimate eligibility based on the validity of the respondent's email address; therefore, the functional participation rate is much higher than the reported rate. The participation rate is largely

influenced by the quotas employed to ensure that the final dataset is representative of Pennsylvanians by age and sex category and, separately, by region. The reduced need for weighting ultimately improves the precision of the survey estimates, and participation rate is considered to be less relevant in assessing the quality of web panel surveys.

Margin of Error

The margin of sampling error for this survey is +/- 3.0 percentage points with the conventional 95% degree of desired confidence. This means that in a sample of 1,000 respondents where the distribution of responses is within the vicinity of 50%, there is a 95% chance that if the survey were repeated, the results would not differ from the survey findings by more than 3.0 percentage points. A more extreme distribution of question responses has a smaller error range. Suppose that 80% of the respondents answer "Yes" and 20% answer "No;" then the sampling error in this case is 2.4 percentage points. That is, each percentage has a sampling error of +/- 2.4 percentage points.

DEMOGRAPHIC PROFILE OF SURVEY RESPONDENTS

The following table displays the frequencies and percentages of survey respondents by key demographic characteristics.

Table 3. Demographic Profile of Respondents[1]

|	Number	Percent
Gender		
Male	510	48.5%
Female	541	51.5%
Age Category		
18-34 years	298	28.4%
35-64 years	512	48.7%
65 years of age or older	241	22.9%
Race/Ethnicity		
Hispanic	26	2.5%
White, non-Hispanic	922	87.7%
Black - African American, non-Hispanic	65	6.2%
Some other race (includes 2+ races), non-Hispanic	38	3.6%
Marital Status		
Single / Never married	314	29.9%
Married / Living with partner	563	53.6%
Widowed / Divorced / Separated	173	16.5%

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[1] Numbers may not add up to 1,051 due to rounding and the exclusion of "don't know" responses.

Table 3 (Continued). Demographic Profile of Respondents[2]

	Number	Percent
Educational Attainment		
High school diploma/GED or less	253	24.1%
Some college (including 2-year/technical degree)	375	35.7%
Four-year college degree	271	25.8%
Graduate work	152	14.5%
Household Income		
Less than $30,000	246	24.5%
$30,000 to $59,999	312	31.1%
$60,000 to $99,999	251	25.0%
$100,000 or more	195	19.4%
Region		
Northern	74	7.0%
Central	98	9.3%
Northeast	172	16.4%
Southwest	212	20.2%
South Central	159	15.1%
Southeast	336	32.0%
County Density		
Urban	799	76.0%
Rural	252	24.0%
Voter Registration		
Registered to vote	867	83.2%
Not registered to vote	175	16.8%
Political Affiliation		
Republican	331	38.7%
Democrat	402	47.0%
Other (inc. Independent, Libertarian, & No Affiliation)	122	14.3%
Political Ideology		
Conservative	362	36.7%
Moderate	327	33.1%
Liberal	298	30.2%
Child Status		
Minor children living in household	290	27.6%
No minor children living in household	761	72.4%
Household Size	**Mean**	
Total household size	2.69	
Number of adults living in household	2.21	
Number of minor children living in household	0.48	

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[2] Numbers may not add up to 1,051 due to rounding, as well as the exclusion of "don't know" responses.

APPENDIX A – MAP AND LIST OF SURVEY REGIONS
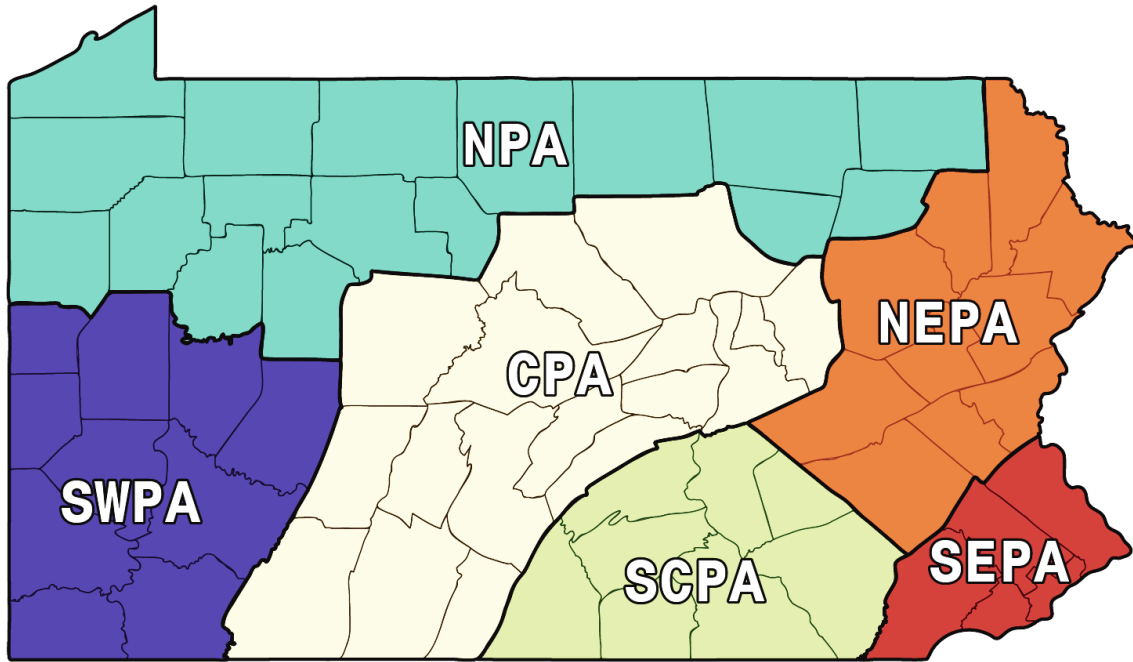
Northern	Central	Northeast
Bradford	Bedford	Berks
Cameron	Blair	Carbon
Clarion	Cambria	Lackawanna
Crawford	Centre	Lehigh
Elk	Clearfield	Luzerne
Erie	Clinton	Monroe
Forest	Columbia	Northampton
Jefferson	Fulton	Pike
McKean	Huntingdon	Schuylkill
Mercer	Juniata	Wayne
Potter	Lycoming	
Sullivan	Mifflin	
Susquehanna	Montour	
Tioga	Northumberland	
Venango	Snyder	
Warren	Somerset	
Wyoming	Union	

Southwest	South Central	Southeast
Allegheny	Adams	Bucks
Armstrong	Cumberland	Chester
Beaver	Dauphin	Delaware
Butler	Franklin	Montgomery
Fayette	Lancaster	Philadelphia
Greene	Lebanon	
Indiana	Perry	
Lawrence	York	
Washington		
Westmoreland		

APPENDIX B – SURVEY INSTRUMENT

Intro.

You are invited to participate in a survey that is being conducted by the Center for Survey Research at Penn State Harrisburg.

Please click ">>" to tell us a bit about yourself.

State. In what state do you live?

◯ Connecticut (1)

◯ Delaware (2)

◯ Maryland (3)

◯ New Jersey (4)

◯ New York (5)

◯ Ohio (6)

◯ Pennsylvania (7)

◯ Virginia (8)

◯ Some other state (9)

County. In what county do you live?

◯ I do not live in Pennsylvania (777)

◯ I don't know what county I live in (888)

◯ List of Pennsylvania counties (1 → 133, FIPS codes)

Zip. What is your zip code?

_____

Gender. Which of the following best describes your gender?

    ○ Male (1)

    ○ Female (2)

- -

Age. What is your age?

_____

Programming Note: If the respondent lives in Pennsylvania, provides their county, provides a valid Pennsylvania zip code, and is 18 years of age or older, they proceed to the survey. Otherwise, they are not eligible.

Inform. Thank you for that information. You are eligible to participate in the survey. Please read the following information carefully and indicate whether you agree to participate in the survey below.

Your participation is voluntary, and the survey takes about 15 minutes. All of your answers will remain confidential. No one on the research team has access to your personal information. You have the right to end the survey at any time. If you have any questions about the survey, please feel free to contact the Center for Survey Research at PSUsurveys@psu.edu. Your voluntary participation indicates your consent to participate in this research. Are you willing to participate?

    ○ Yes, I am willing to participate (1) ➔ Continue to survey

    ○ No, I am not willing to participate (2) ➔ End survey

    ○ Don't know / Not sure (9) ➔ End survey

Agree. Thank you for agreeing to participate! The first questions ask about **the United States and Pennsylvania.**

US_Dir. Generally speaking, would you say that things in the **United States** are going in the right direction, or going in the wrong direction?

○ Right direction (1)

○ Wrong direction (2)

○ Don't know / not sure (9)

PA_Dir. Now thinking about **Pennsylvania**, would you say that things are going in the right direction, or going in the wrong direction?

○ Right direction (1)

○ Wrong direction (2)

○ Don't know / Not sure (9)

Problem. In general, what is the biggest problem facing Pennsylvania today? Please be as specific as possible. Entering something that is not a real response will invalidate your survey.

_____

Confidence. How much **confidence** do you have in each of the following levels of government to fix domestic problems? *Note: Rotate order of presentation of government levels.*

	Quite a lot (4)	Some (3)	Very little (2)	None at all (1)	Don't know / Not sure (9)
Federal government in Washington (Conf_Fed)	○	○	○	○	○
Pennsylvania state government (Conf_State)	○	○	○	○	○
Local government (Conf_Local)	○	○	○	○	○

TrustMore. Who do you trust **more** to fix Pennsylvania's problems? *Note: Rotate presentation of responses 1 and 2.*

    ○ Pennsylvania state legislature (1)

    ○ Governor Wolf (2)

    ○ I do not trust either one more than the other (3)

    ○ Don't know / Not sure (9)

Gun_Difficult. Do you think it is too easy to buy a gun in the U.S. today, too difficult to buy a gun in the U.S. today, or about right?

    ○ Too easy (1)

    ○ Too difficult (3)

    ○ About right (2)

    ○ Don't know / Not sure (9)

T_Opioid. The next questions ask about opioids. Opioids are a type of drug that includes pain medications like Percocet, OxyContin, Vicodin, codeine, and morphine, and other drugs such as heroin and fentanyl.

OpioidProb. Think about the problem of opioid addiction in Pennsylvania as a whole and in your local community. Would you describe the opioid addiction as an emergency; a major problem, but not an emergency; a minor problem; or not at a problem at all in each place? *Note: Rotate presentation of questions.*

	An emergency (4)	A major problem, but not an emergency (3)	A minor problem (2)	Not a problem at all (1)	Don't know / Not sure (9)
In Pennsylvania as a whole (OpioidProb_PA)	○	○	○	○	○
In your local community (OpioidProb_Local)	○	○	○	○	○

- -

Blame. Who do you think is **MOST** to blame for the problem of opioid addiction? *Note: Rotate presentation of responses 1 through 6.*

○ Doctors who prescribe painkillers (1)

○ Drug dealers who sell opioids (2)

○ People who take opioids (3)

○ Pharmaceutical companies that create and sell prescription painkillers (4)

○ The government, which is responsible for approving prescription painkillers (5)

○ Law enforcement (6)

○ Don't know / Not sure (9)

Reason. Do you think someone who has an opioid addiction has a personal weakness or an illness? *Note: Rotate presentation of responses 1 and 2.*

○ Personal weakness (1)

○ Illness (2)

○ Don't know / Not sure (9)

Prescribe. Have you, yourself, ever been prescribed an opioid, such as Percocet, OxyContin, or Vicodin for pain?

○ Yes, and I took it (1)

○ Yes, but I did not take it (2)

○ No, I have never been prescribed an opioid (3)

○ Don't know / Not sure (9)

Worry. How much do you worry that you, yourself, could become addicted to a prescribed pain medication?

○ A great deal (4)

○ A moderate amount (3)

○ A little (2)

○ Not at all (1)

○ Don't know / Not sure (9)

KnowSomeone. Do you personally know anyone who has been addicted to opioids, including prescription painkillers such as Percocet, OxyContin or Vicodin, or other drugs such as heroin or fentanyl?

○ Yes (1)

○ No (2)

○ Don't know / Not sure (9)

AttnChk2. Naloxone can be used to reverse an overdose and keep someone alive. Please select "False" to continue with the survey.

○ True (1)

○ False (2)

○ Don't know (9)

T_Dem. These last questions are for classification purposes only.

VoterReg. Are you currently registered to vote?

○ Yes (1)

○ No (2)

○ Don't know / Not sure (9)

If "Yes" to VoterReg, ask Pol_Affil.
Pol_Affil. What is your current **registered** party affiliation?

○ Republican (1)

○ Democrat (2)

○ Independent / No affiliation (3)

○ Constitution (4)

○ Green (5)

○ Libertarian (6)

○ Other (7)

○ Don't know / Not sure (9)

Pol_View. How would you best describe your political views?

◯ Very conservative (1)

◯ Somewhat conservative (2)

◯ Moderate (3)

◯ Somewhat liberal (4)

◯ Very liberal (5)

◯ Don't know / Not sure (9)

Ethnicity. Do you consider yourself to be Hispanic or Latino?

◯ Yes (1)

◯ No (2)

◯ Don't know / Not sure (9)

Race. Which of the following best describe your race? You can select all that apply.

□ White (1)

□ Black or African American (2)

□ Asian (3)

□ American Indian or Alaska Native (4)

□ Native Hawaiian or Pacific Islander (5)

□ Something else (6) _____

□ Don't know / Not sure (9)

HH_Adult. Including yourself, how many adults (18 or older) live in your household? If you live alone, please enter "1".

HH_Child. How many children under the age of 18 live in your household, regardless of whether or not they are related to you? If no children live in your household, enter "0".

MaritalStatus. What is your marital status?

○ Married (1)

○ Living with partner (2)

○ Widowed (3)

○ Divorced (4)

○ Separated (5)

○ Single / Never married (6)

○ Don't know / Not sure (9)

Education. Which of the following categories best describes your educational level?

○ Less than a high school diploma or GED (1)

○ High school diploma or GED   (2)

○ Some college (3)

○ Two-year degree (Associate's) or technical degree (i.e., trade degree) (4)

○ Four-year college graduate (5)

○ Graduate work   (6)

○ Don't know / Not sure (9)

Income. What is your total annual household income, before taxes?

○ Under $10,000 (0)

○ $10,000 to $19,999 (1)

○ $20,000 to $29,999 (2)

○ $30,000 to $39,999 (3)

○ $40,000 to $49,999 (4)

○ $50,000 to $59,999 (5)

○ $60,000 to $69,999 (6)

○ $70,000 to $79,999 (7)

○ $80,000 to $89,999 (8)

○ $90,000 to $99,999 (9)

○ $100,000 to $109,999 (10)

○ $110,000 to $119,999 (11)

○ $120,000 to $129,999 (12)

○ $130,000 to $139,999 (13)

○ $140,000 to $149,999 (14)

○ $150,000 or more (15)

○ Don't know / Not sure (99)

End. Thank you for your participation! Please click ">>" to submit your survey.