

# Preventing Excessive Alcohol Use Starts with Meaningful Data

## Increasing Alcohol Epidemiology Capacity in Texas

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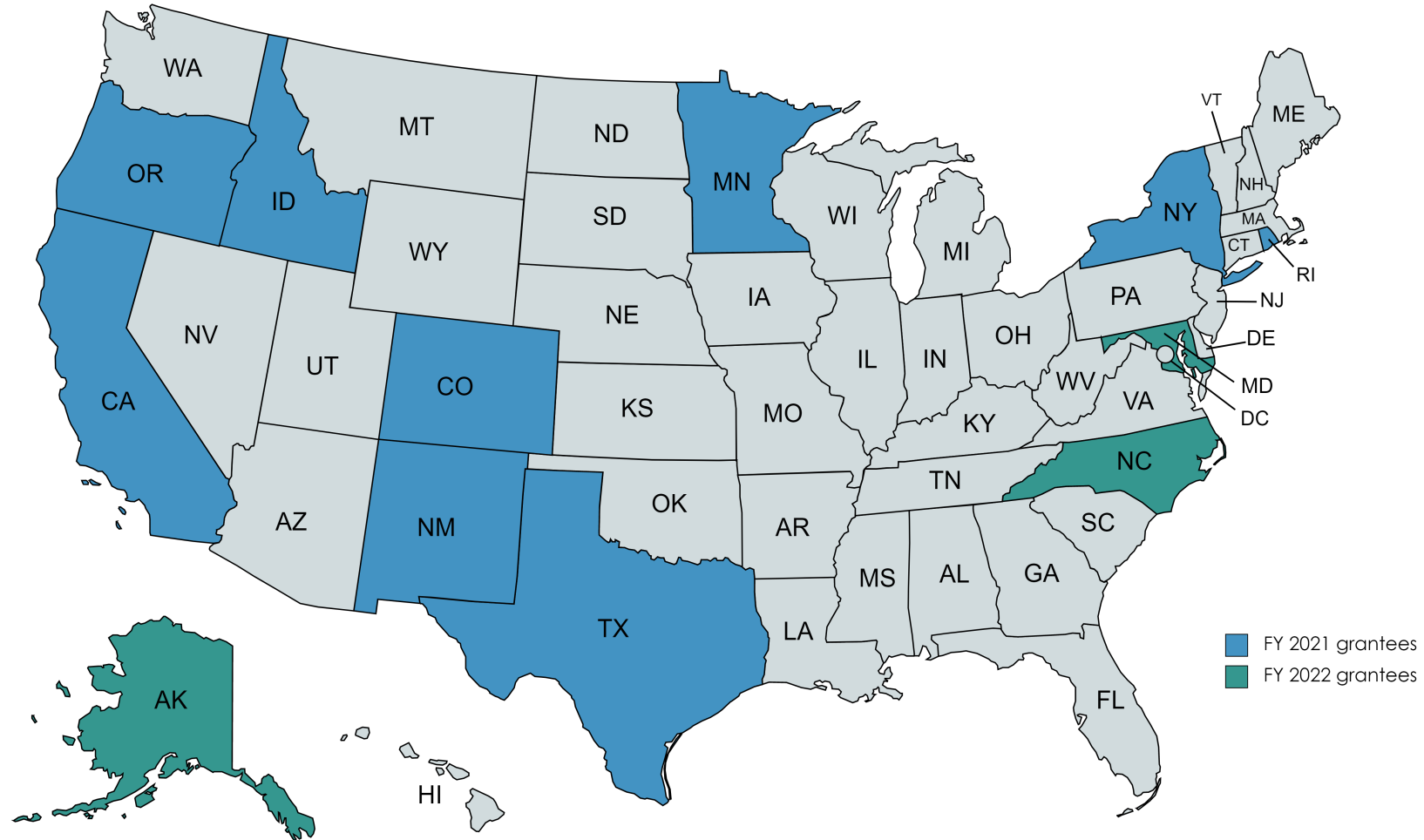


# Today's Presentation

- Describe our current project funded by the Centers for Disease Control and Prevention to improve the state's epidemiological capacity related to excessive alcohol use

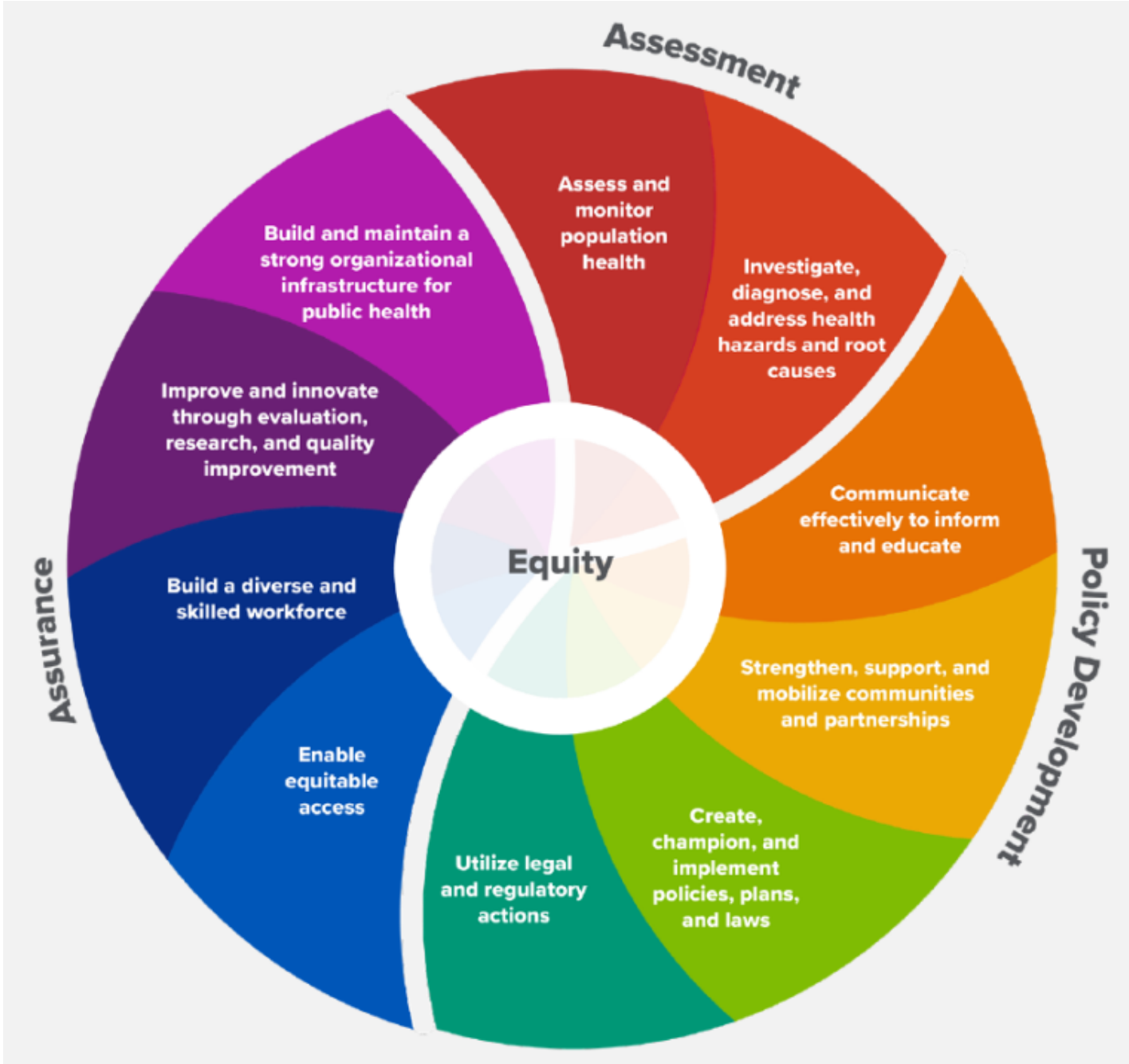
# Promoting Population Health through Increased Capacity in Alcohol Epidemiology and the Prevention of Excessive Alcohol Use

- Funded by the Centers for Disease Control and Prevention
- Goal: Build state capacity in excessive alcohol epidemiology



- Advancement Strategy Consulting (T/TA center)

# Ten Essential Public Health Services





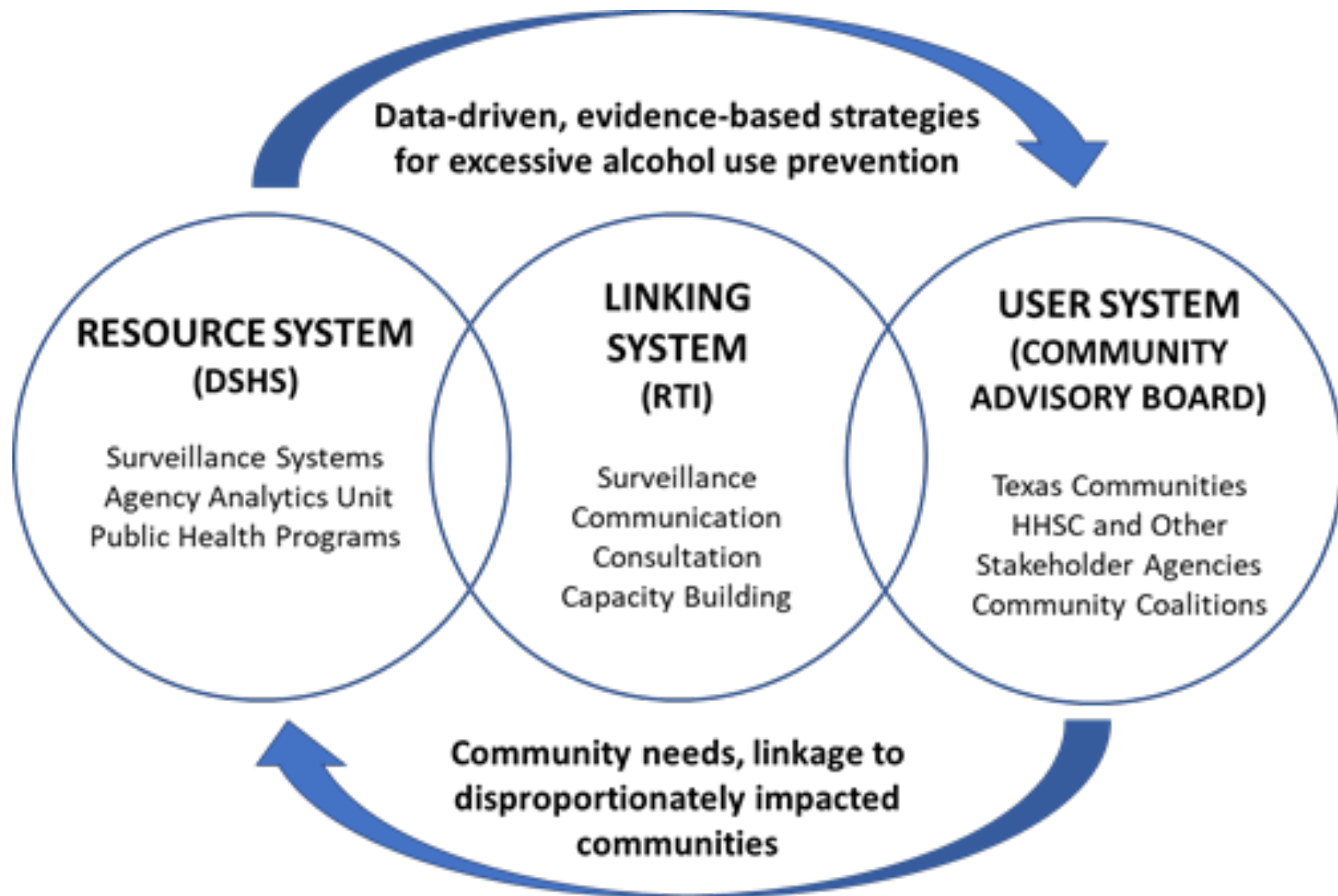


Figure adapted from Robinson et al. (2005).

# Excessive alcohol use: Associated mortality and cost to society

- Excessive alcohol use linked to more than 140,000 deaths per year<sup>1</sup>
  - Motor vehicle traffic crashes leading cause for about 10%
  - Shortened the lives of those who died by an average of 26 years<sup>1</sup>
- Excessive drinking responsible for 1 in 10 deaths among working-age adults aged 20-64 years<sup>2</sup>
- The economic costs of excessive alcohol consumption in 2010 were estimated at \$249 billion, or \$2.05 a drink<sup>3</sup>

1. Centers for Disease Control and Prevention. [Alcohol-Related Disease Impact Application website](#). Accessed April 19, 2022.

2. Stahre M, Roeber J, Kanny D, Brewer RD, Zhang X. [Contribution of excessive alcohol consumption to deaths and years of potential life lost in the United States](#). *Prev Chronic Dis* 2014;11:130293.

3. Sacks JJ, Gonzales KR, Bouchery EE, Tomedi LE, Brewer RD. [2010 National and State Costs of Excessive Alcohol Consumption](#)<sup>external icon</sup>. *Am J Prev Med* 2015; 49(5):e73–e79.



# Excessive alcohol use: Binge drinking

- Most common pattern of excessive alcohol use
- 5 or more drinks for men/ 4 or more drinks per women **per occasion**
  - Occasion: 2-3 hours
- Responsible for more than 40% of deaths and 75% of costs associated with excessive alcohol use

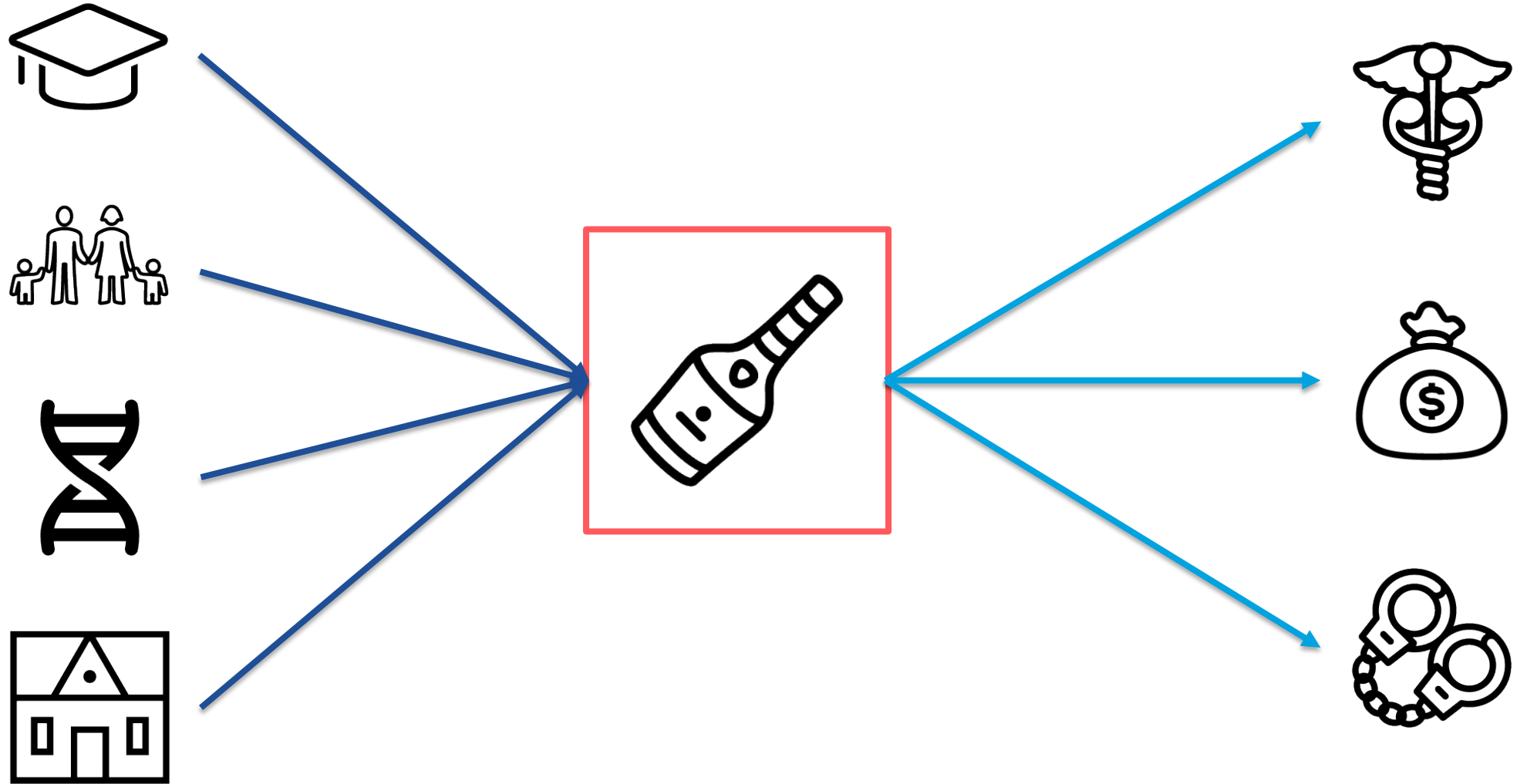


# Excessive alcohol use: Other measures

- Any alcohol use by those under age 21
- Any alcohol use by pregnant women
- Heavy drinking
  - 8 or more drinks per week for women
  - 15 or more drinks per week for men



# Risk/protective factors $\Rightarrow$ Excessive drinking $\Rightarrow$ Consequences

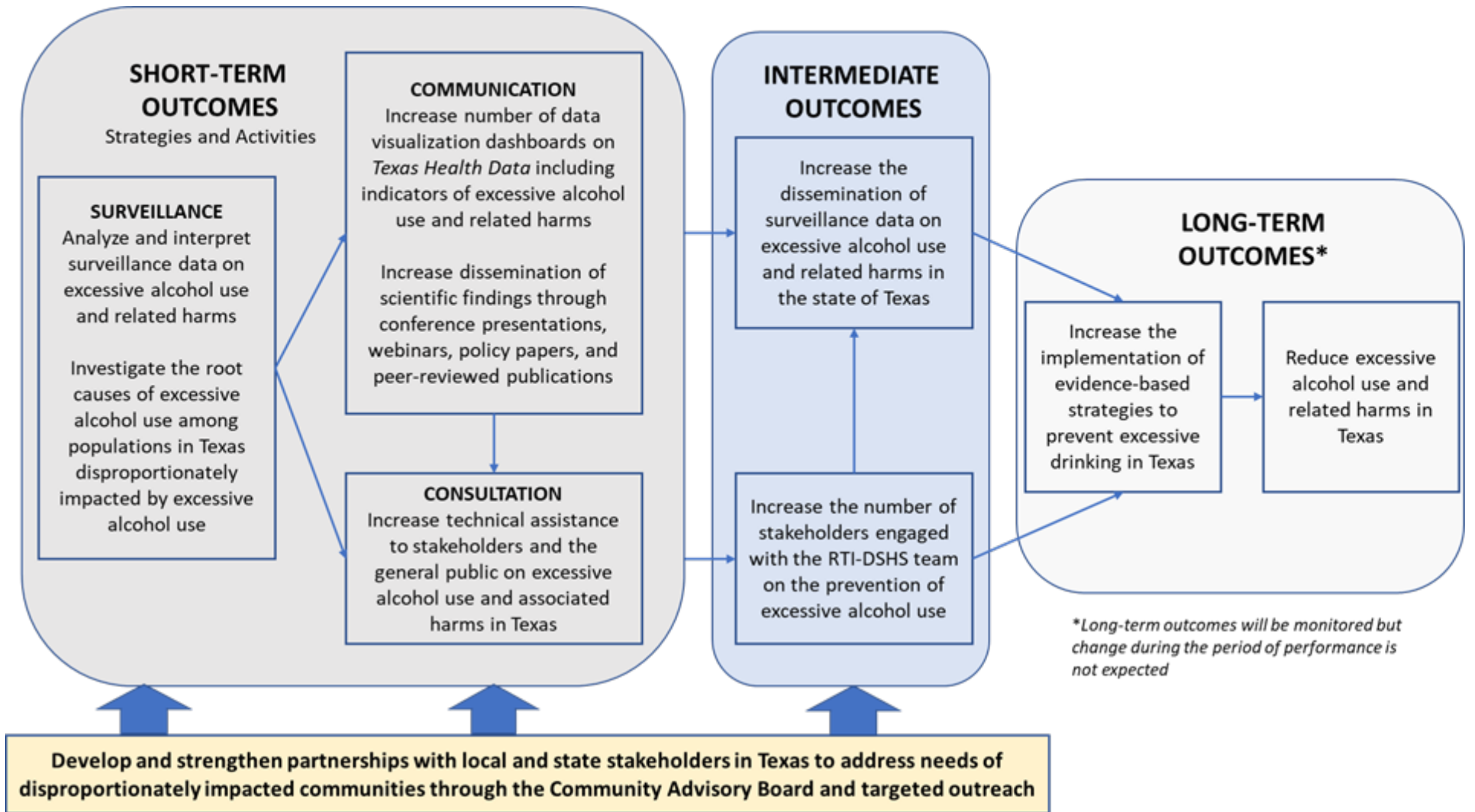




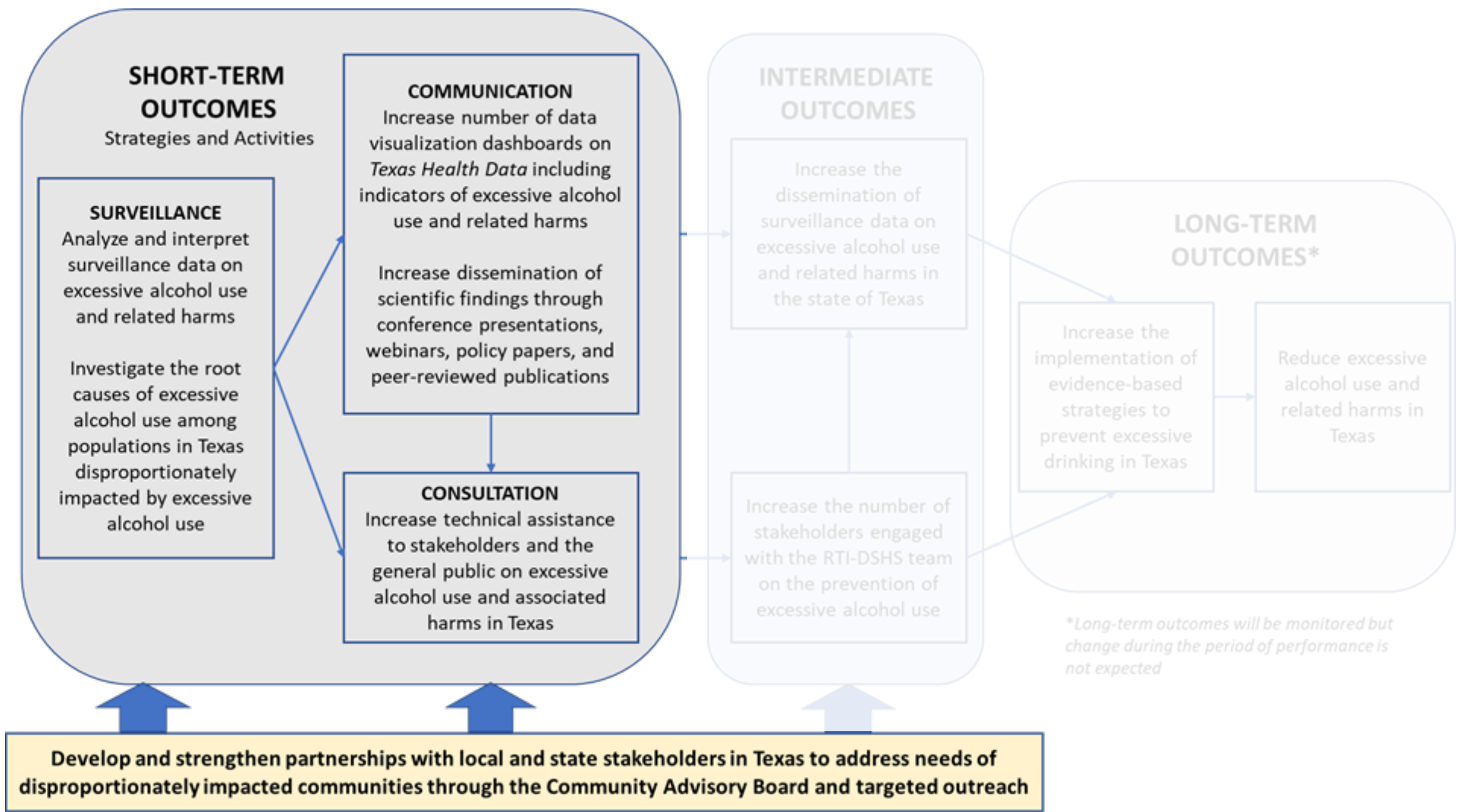
# Risk and protective factors: Looking upstream

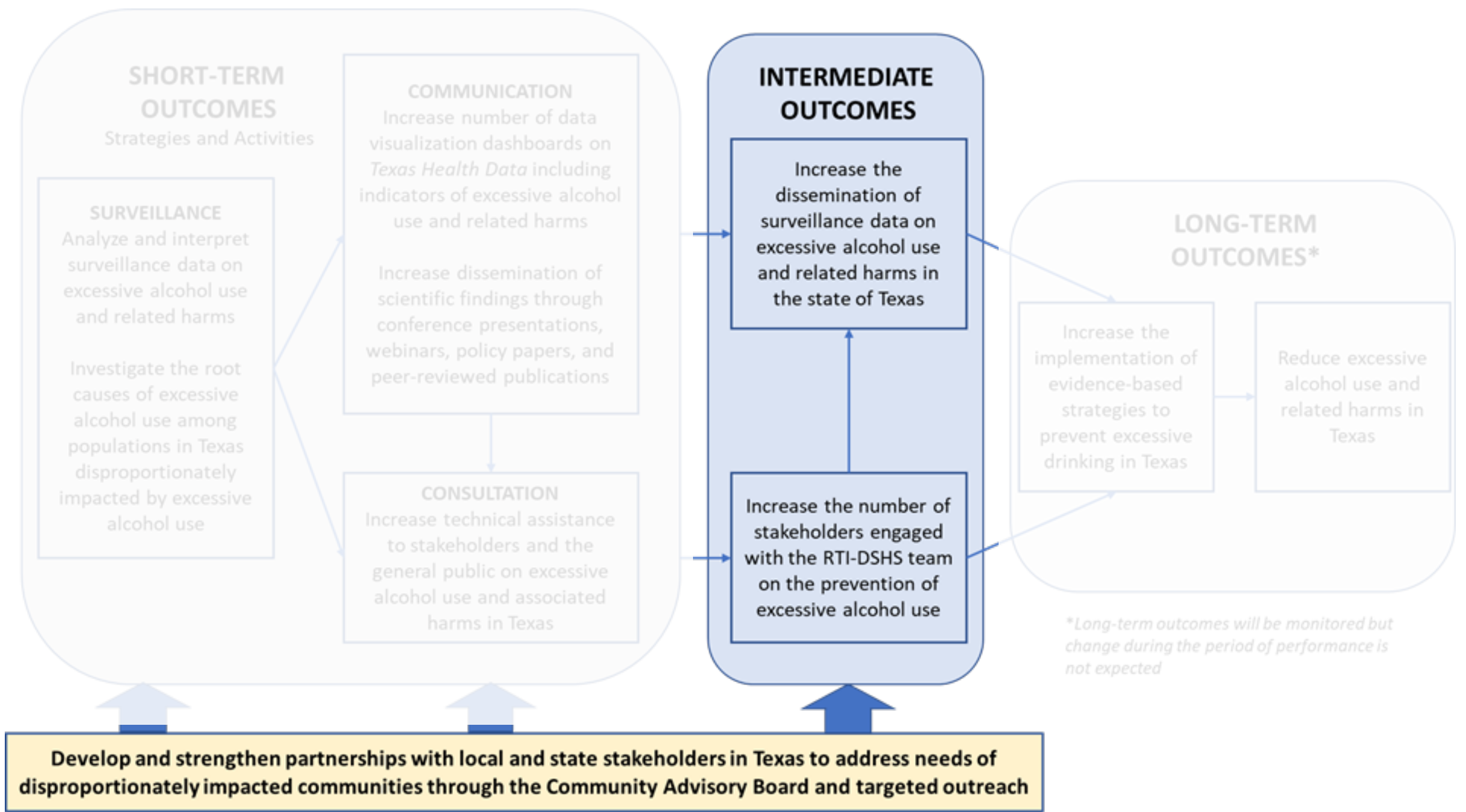


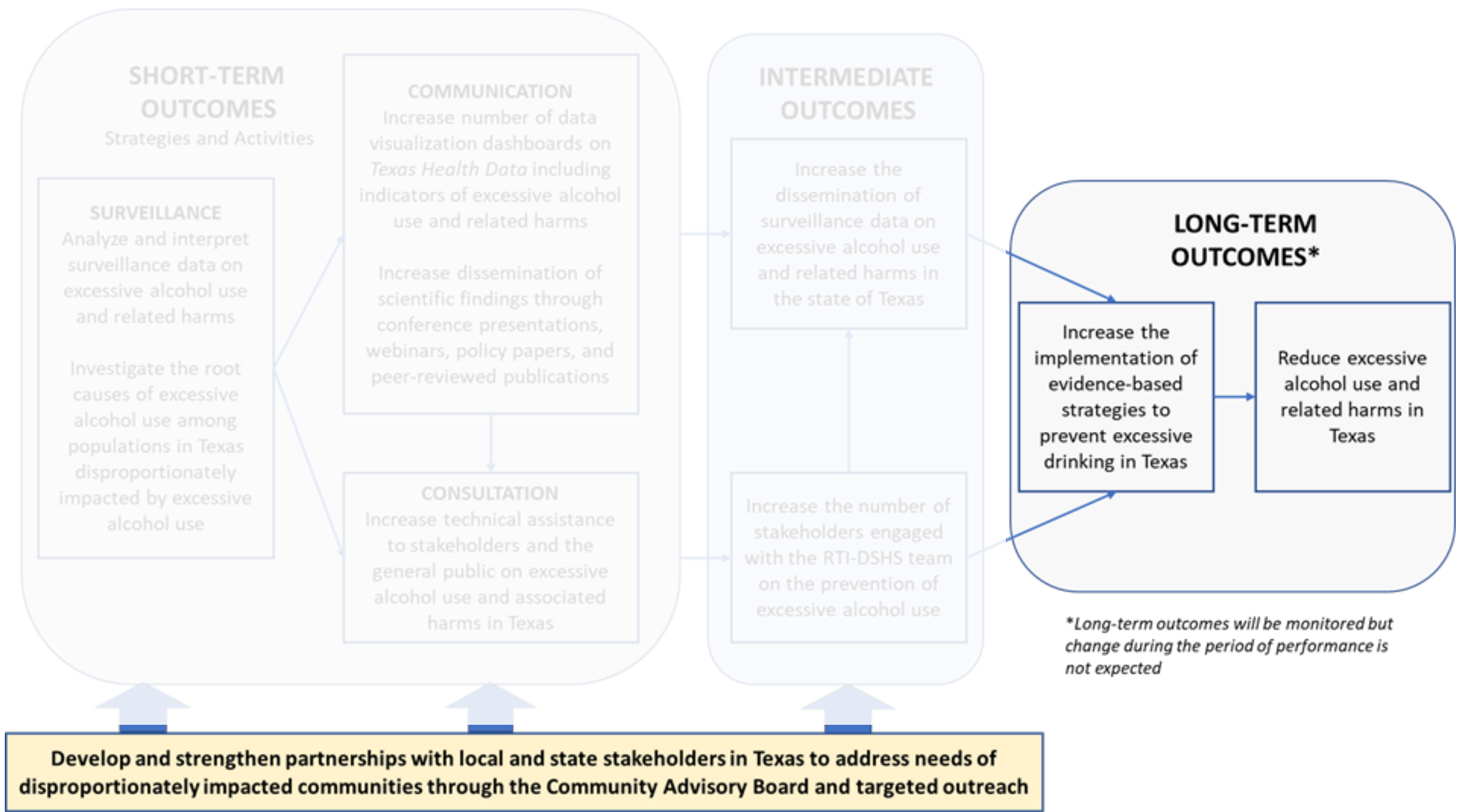
Figure adapted from *The Story of the River* (Aylward, 2020)











# Forming the Community Advisory Board



- Convened by Texans for Safe and Drug-Free Youth
- Up to 12 members
- Knowledge of state and community-level needs, resources, and strengths
- Experience with identifying, using, and disseminating findings from datasets at local and state levels
- Experience participating in advisory boards, committees, and other community-level engagements
- Organizationally invested in contributing to the development of sustainable mechanisms to produce actionable information to prevent excessive alcohol use

# Identifying data sources



- Identifying and collecting a variety of data sources that describe alcohol use and other aspects of life in Texas
  - Publicly available with no fees associated
  - Ongoing data collection
- RTI and DSHS will analyze the data to better understand relationships between root causes and risk/protective factors associated with excessive alcohol use
- We want to focus on topics that are meaningful to Texas and that produce actionable information

# Resulting search: Data sources of interest

- **Texas School Survey on Drug and Alcohol Use (TSS)**
- **Fatality Analysis Reporting System (FARS)**
- **Texas Health Care Information Collection (THCIC)**
- **Behavioral Risk Factor Surveillance System (BRFSS)**
- Licensed Alcohol Retailers (LAR)
- Local Alcohol Policies (LAP)
- Sales and Consumption Estimates (SCE)
- National Survey on Drug Use and Health (NSDUH)
- Youth Risk Behavior Surveillance System (YRBSS)
- Pregnancy Risk Assessment Monitoring System (PRAMS)
- Texas College Survey of Substance Use (TCSS)
- Texas Vital Statistics (VSTAT)
- National Poison Data System (NPDS)
- American Community Surveys (ACS)
- Area Health Resource Files (AHRF)
- Opportunity Index (OI)
- Area Deprivation Index (ADI)
- Social Vulnerability Index (SVI)



# Customized profile of risk and protective factors

Risk Indicators	Average Across Counties						County Rank
	-3	-2	-1	0	1	2	
<b>Consequences of Alcohol and Other Drug Use</b>							
Alcohol-Related Hospitalizations and Emergency Room Visits per 10,000 Persons Age 0 to 19 [7; e]			-0.31				1
Alcohol-Related Hospitalizations and Emergency Room Visits per 10,000 Persons Age 20 to 24 [7; e]			-0.25				1
Alcohol-Related Hospitalizations and Emergency Room Visits per 10,000 Persons Age 25 or Older [7; e]						3.02	158
Drug-Related Hospitalizations and Emergency Room Visits per 10,000 Persons Age 0 to 24 [7; e]		-1.55					1
Drug-Related Hospitalizations and Emergency Room Visits per 10,000 Persons Age 25 or Older [7; e]		-1.82					3
Hospitalizations Due to Self-Inflicted Injuries per 10,000 Persons Age 0 to 24 [7; f]		-1.16					1
Hospitalizations Due to Self-Inflicted Injuries per 10,000 Persons Age 25 or Older [7; f]		-1.58					1
Any Opioid-Related Deaths per 10,000 Persons [7; f]		-1.25					1
Heroin-Related Deaths per 10,000 Persons [7; f]			-0.52				1
Unintentional Poisoning Deaths per 10,000 Persons [7; f]		-1.41					1
Suicide Deaths per 10,000 Persons [7; f]		-1.54					1
Percentage of Total Fatal Motor Vehicle Crashes That Are Alcohol Related [8; g]		-0.99					1
Percentage of Total Fatal, Alcohol-Related Motor Vehicle Crashes that Involved an Underage Person (Persons Under Age 21) [8,9; g]			-0.47				1
Percentage of Investigated Child Maltreatment Cases Involving Alcohol or Drugs [h]						1.58	151
Percentage of School-Based Reportable Offenses Related to Substance Abuse [1, 10; i]		-0.92					1

# Data dashboards to better understand your community's needs

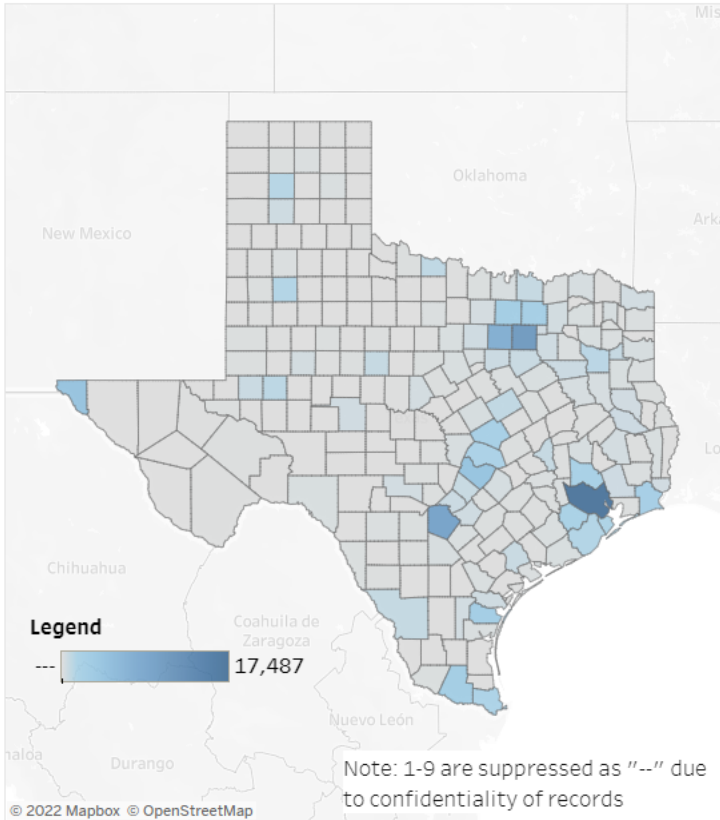
## A Closer Look: County Totals and State Demographics

Use the drop down menus to change these interactive graphics.

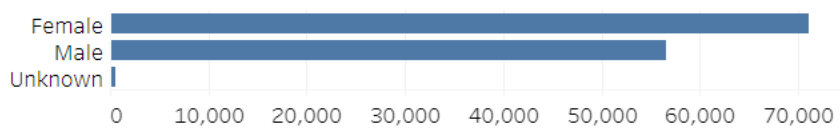
**Opioid Type** 
**Year**

### COUNTIES: Number of All Calls

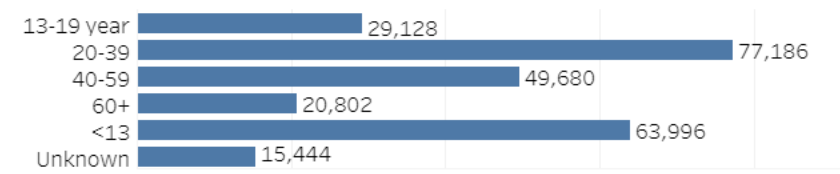
Click on a county to see the number of calls for all years. Years not shown are suppressed. Darker colors on the map represent higher numbers.



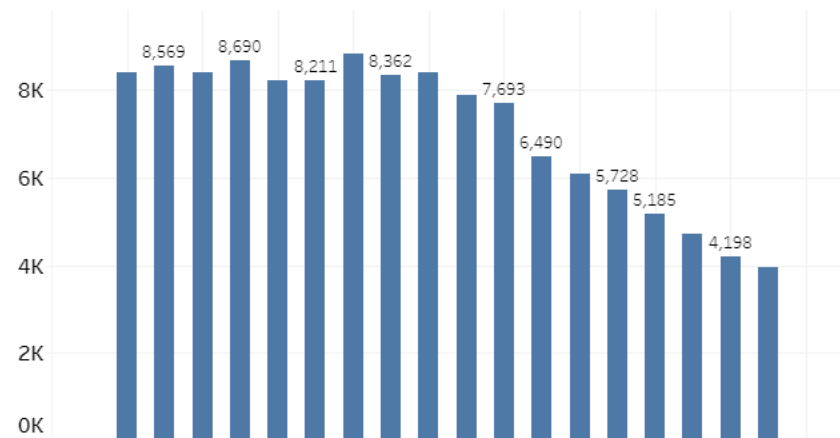
### TEXAS: Number of All Opioids Calls by Sex



### TEXAS: Number of All Calls by Age



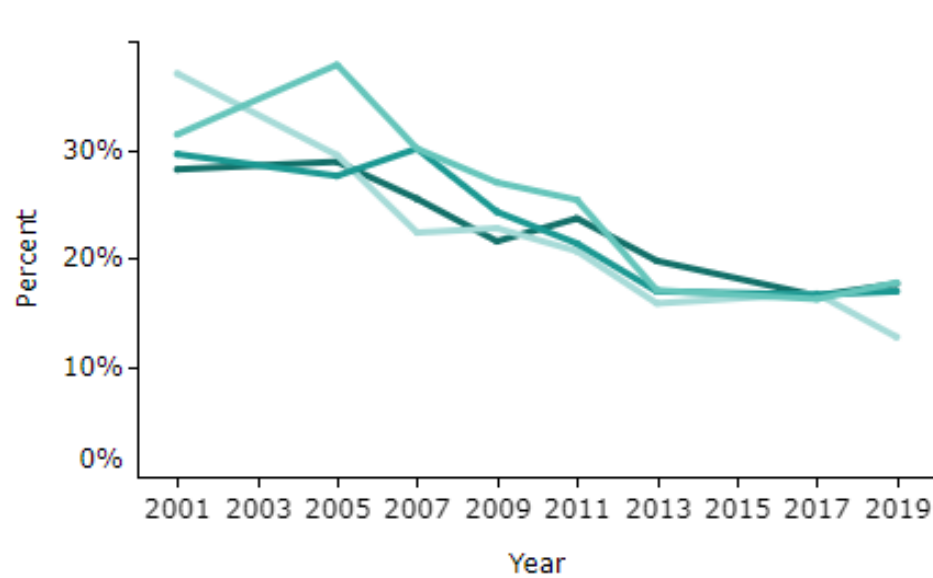
### TEXAS: Total Opioid-Related Calls by Year - 2004 to 2021



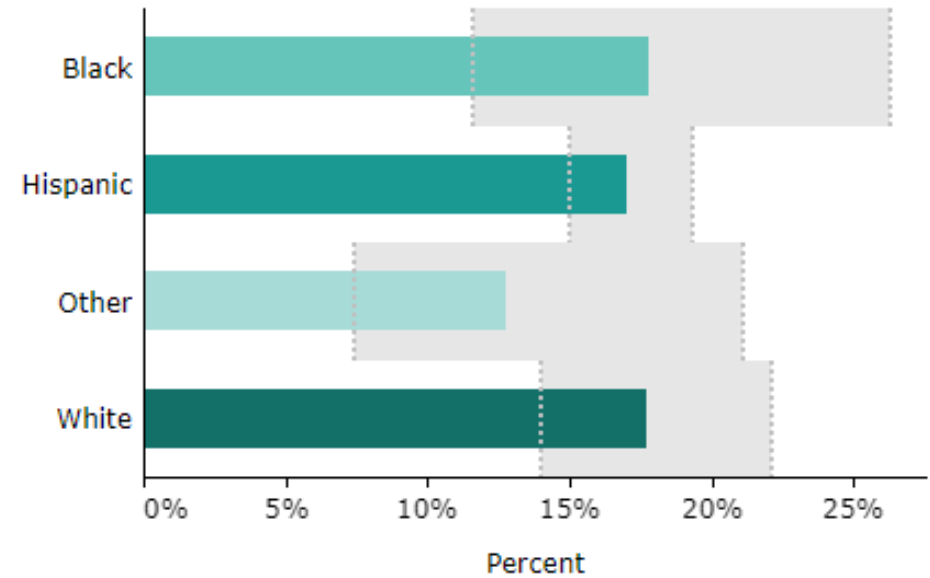


# Show progress on key risk indicators

**Used before age 13** Percentage of students who had their first drink of alcohol other than a few sips before age 13 years



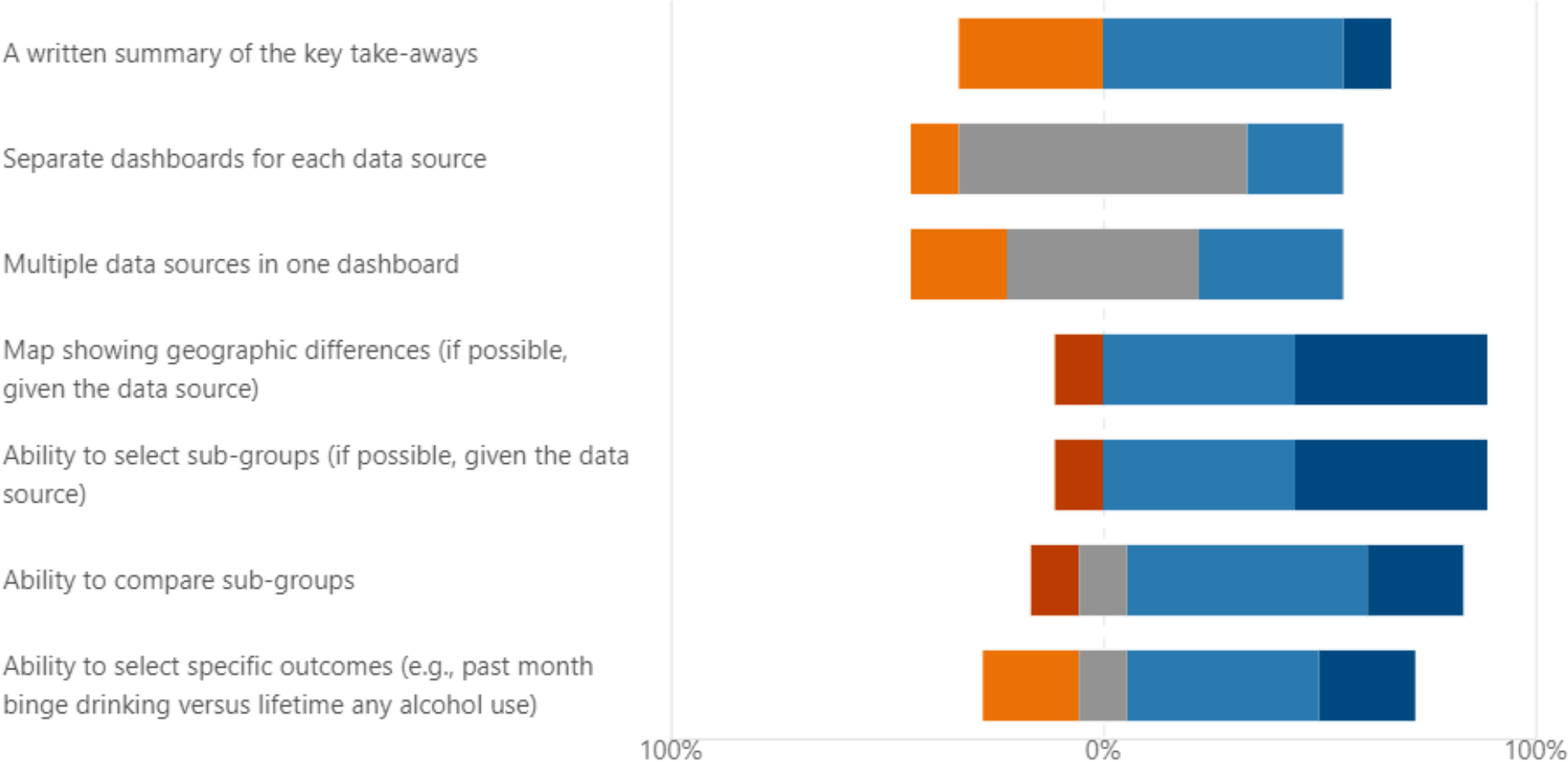
Trends over time



2019 Snapshot

9. On a scale of 1-5 (with 1 being not important and 5 being critical), how important is it for the dashboard to have:

■ Not Important  
 ■ Somewhat Important  
 ■ Neutral  
 ■ Very Important  
 ■ Critical



# Desired dashboard “features”

- Interactive when possible
  - Maps, subgroup comparison
- Ability to select multiple outcomes if possible
- Summary of key takeaways
  - Avoid too much text (“like a research paper”)
- Include resources

# Next Steps

- Year 2: Publish excessive alcohol use dashboard on Texas Health Data
  - Behavioral Risk Factor Surveillance System
  - Fatality Analysis Reporting System
  - Texas School Survey on Drug and Alcohol Use
- Year 3: Add data sources, technical assistance
- Year 4: Transition activities to DSHS
- Year 5: Continued transition, sustainability planning

The background of the slide is a light gray color with a pattern of question marks. The question marks are rendered in a 3D, embossed style, with some appearing in a light beige color and others in a darker gray. A large, white, 3D question mark is positioned in the center-left of the slide, partially overlapping the text.

**Questions?**

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