

July 2023

Presented by: Melanie Munroe



2022 San Joaquin Valley Household Travel Survey

Agenda

Topics

Study Overview

Methodology

Data Collection Summary

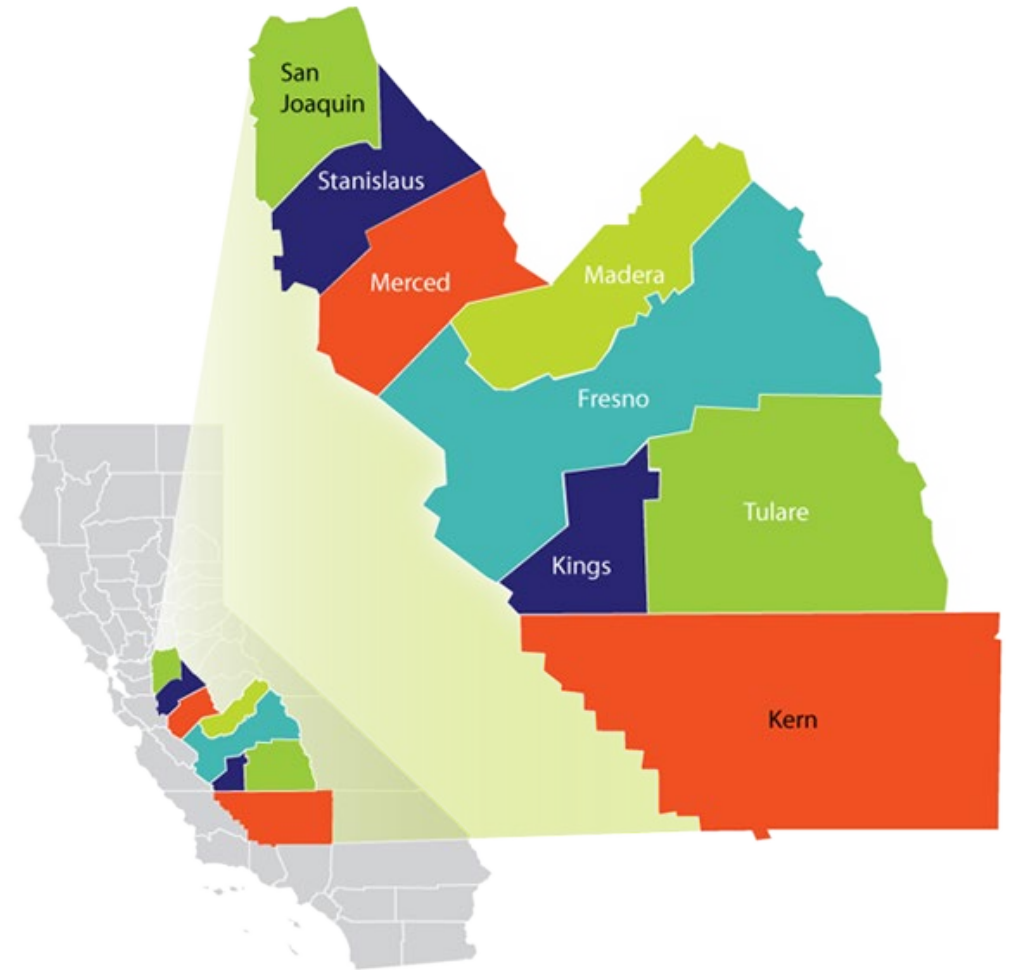
Key Survey Results

Questions



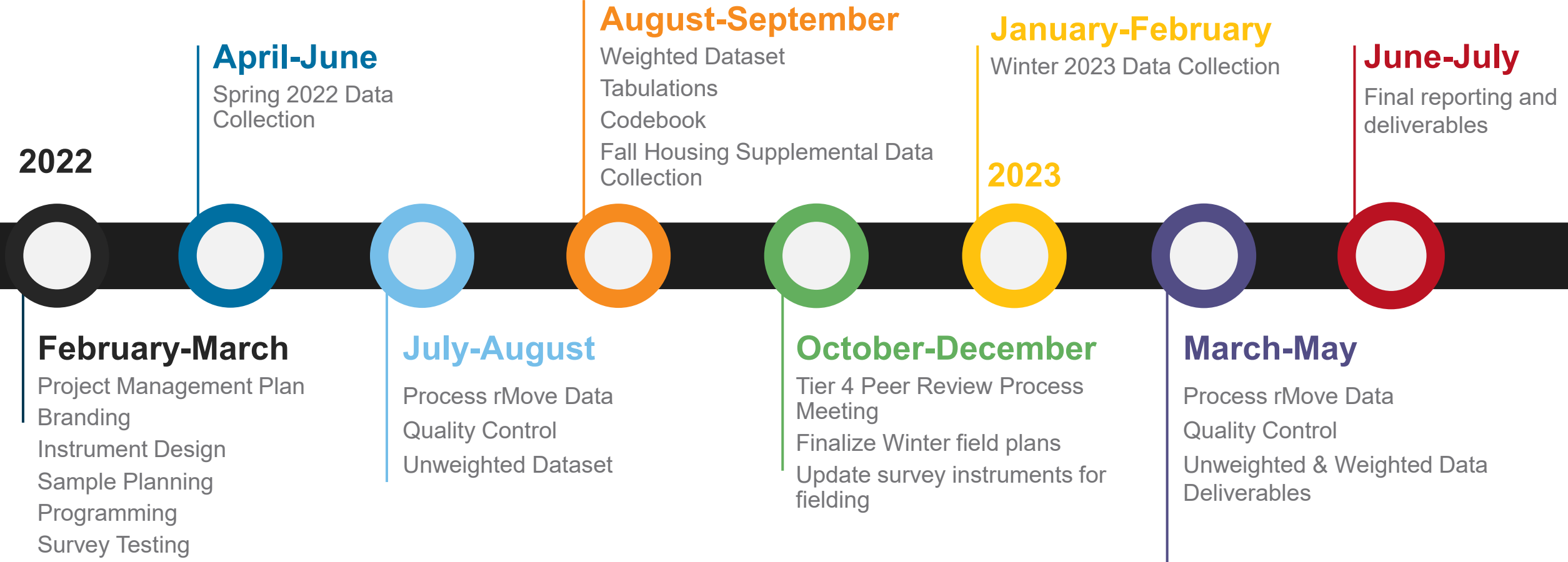
Study Overview

- Collaboration between the eight Metropolitan Planning Organizations (MPOs) in the region led by Fresno Council of Governments (COG).
- Overall goal was to collect representative data from at least 6,850 households in the region to support regional transportation planning priorities and modeling requirements.
- Data collection was scheduled to take place in spring 2022, with fall 2022 contingency dates. Due to lower-than-expected survey response, we finished data collection in February 2023.





Project Timeline



Methodology



Sampling Methodology

Address-based sampling was the primary method for the HTS sample

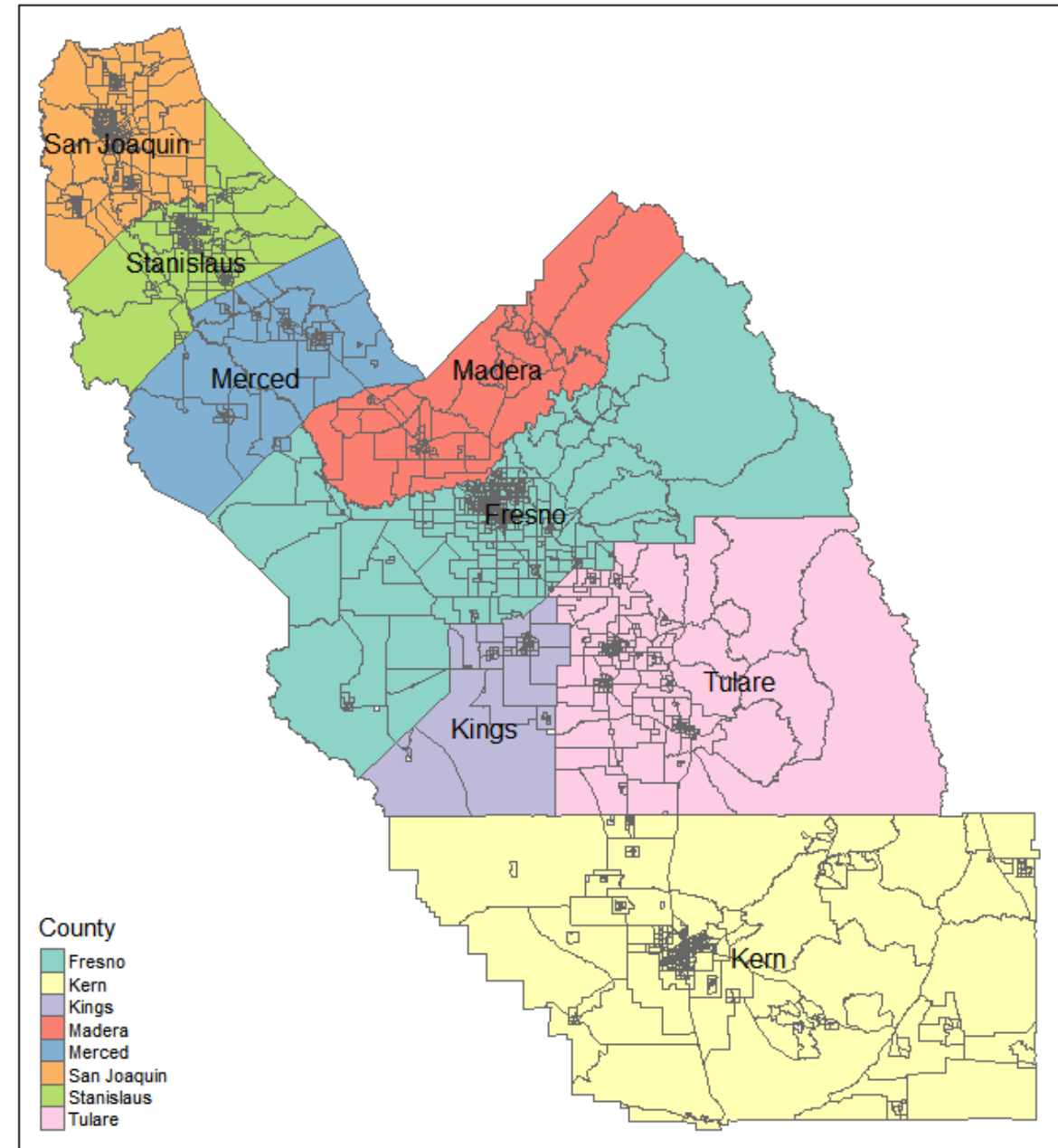
Most of the sample recruitment was accomplished through address-based sampling (ABS), a type of probability sampling, with a focus on reaching county-level targets in collaboration with the Valley MPOs.

Supplemental (non-probability) sample frame

Supplemental sampling methods, primarily non-probability methods, were employed during all waves of data collection to improve survey representation. The supplemental sample included targeted outreach to hard-to-survey populations through transit rider email lists, local housing authorities, support from Nichols Research, a market research firm based in California.

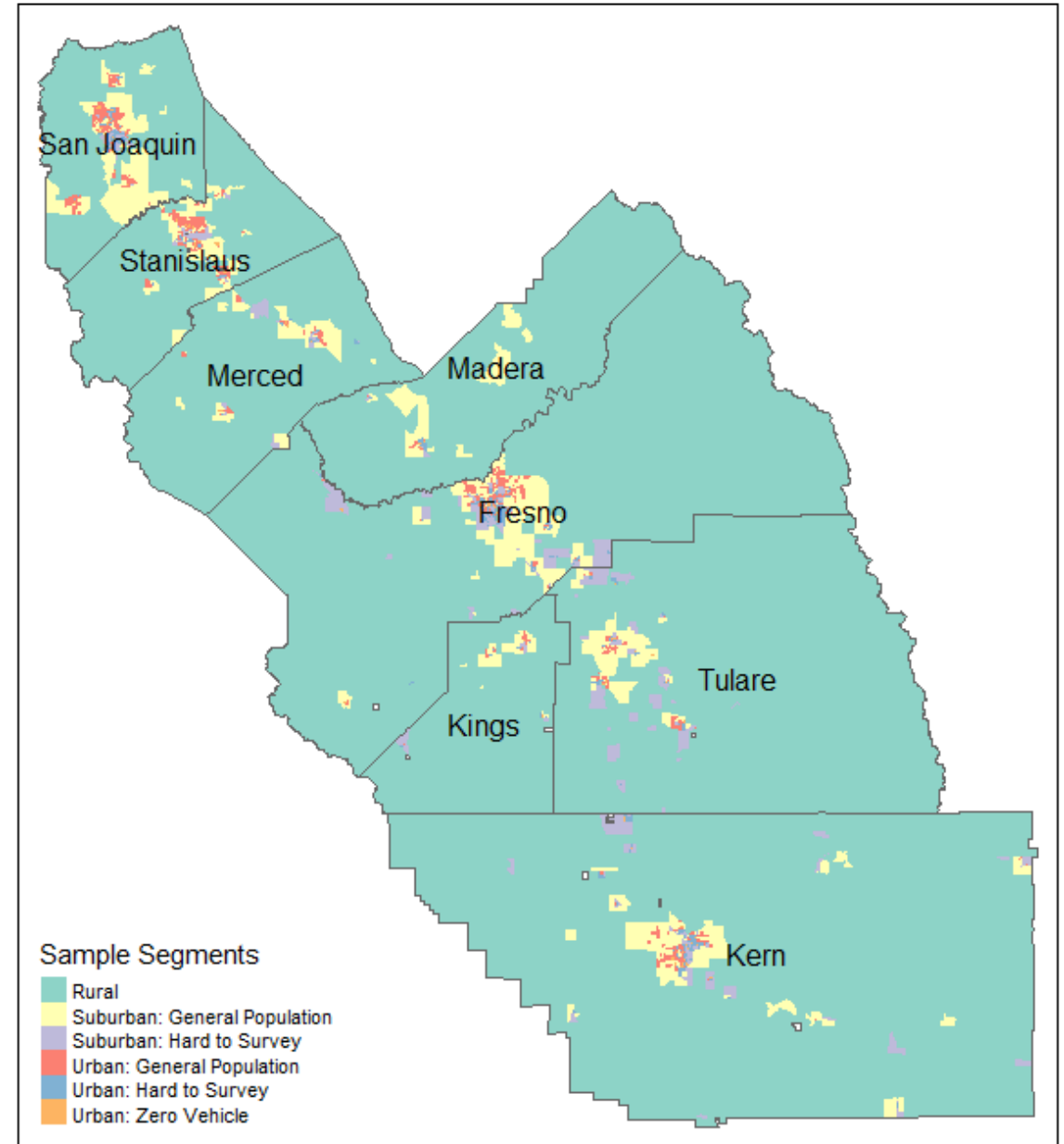
ABS Approach

- RSG geographically stratified the sample using Census Block Group data from the most recently available 2015-2019 American Community Survey 5-year estimates (ACS).
- The most detailed way to stratify the sample is to use Census Block Groups (BGs), which are the smallest geography for which most Census and ACS tables are publicly available. Each BG generally contains between 600 and 3,000 people. According to this ACS data, the region contains 2,310 BGs.



Oversampling

- RSG oversampled rural, suburban, and urban sample segments for historically hard-to-survey populations including residents who are Hispanic, people of color (POC), or lower income.
- In the Urban segment, there is also a targeted oversample for communities with a higher share of zero-vehicle households.





County Targets

COUNTY TARGETS & FINAL COMPLETED HOUSEHOLD SURVEYS

COUNTY	TARGETS	COMPLETED HOUSEHOLDS
Fresno	1,599	1,618
Kern	1,425	1,658
Kings	248	292
Madera	242	354
Merced	419	516
San Joaquin	1,198	1,259
Stanislaus	880	913
Tulare	710	796
TOTAL	6,720	7,406

Data Collection Approach

RECRUITMENT



Mailed Invitation Materials

- Address-based sampling was used by drawing a random sample of addresses from all residential addresses in the survey region.
- An invitation letter was sent to sample addresses followed by a reminder postcard.

PARTICIPATION

Informational Website

- Provided participation modes and links to the survey and smartphone app, rMove.
- Answers frequently asked questions

Call Center

- Participation via telephone in multiple languages
- Answer participant questions

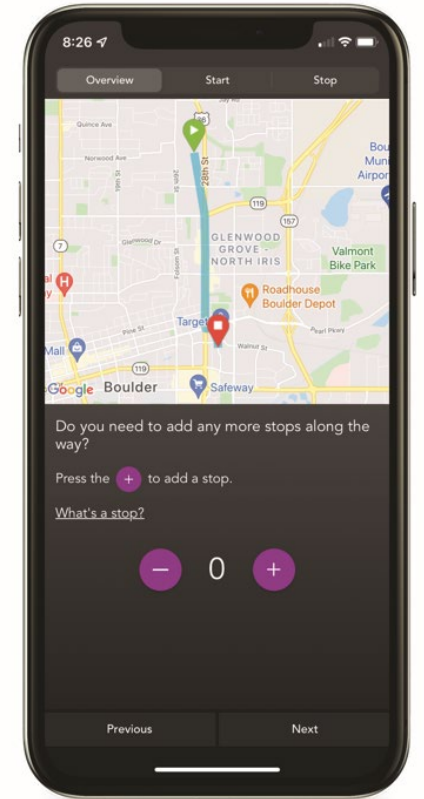
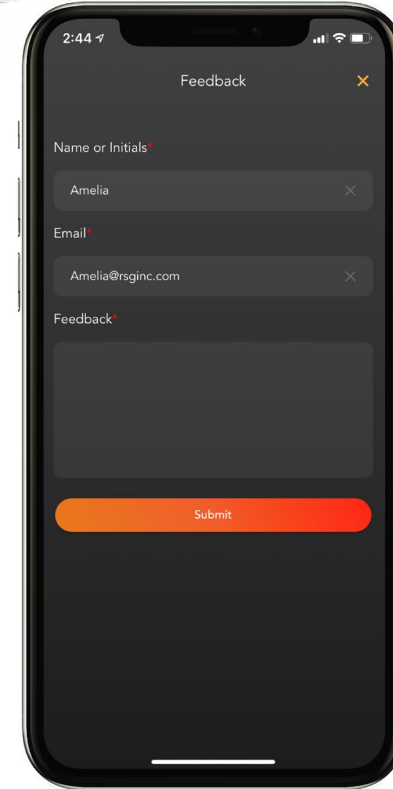
Invitation Materials

The collage displays three types of invitation materials for the Central California Travel Survey:

- Mailed Letter:** A letter from Diana Nguyen, Executive Director of the San Joaquin Valley Regional Planning Agencies' Directors' Committee. It includes a return address (2035 Tulare Street, Suite 201, Fresno, CA 93721), a recipient address field, and a list of participating agencies from San Joaquin, Tulare, Merced, Madera, Stanislaus, Kern, Kings, and Fresno counties.
- Website Screenshot:** A screenshot of the survey website showing options to download the rMove app or sign up at CentralCAtravel.com, along with a frequently asked questions section.
- Postcard:** A postcard titled "TELL US HOW YOU GET AROUND" with a \$20-35 gift card incentive. It features images of various transportation modes and a QR code for access.

Smartphone App Participation

- Customized answer choices for each household
- Trip validation and editing
- User can add, split, and merge trips
- In-app proxy reporting for children
- Respondent “nudging” through reminder notifications
- Ability to ask questions and provide feedback in the app



150k+
Persons



500k+
Days of Data



2 million+
Trips



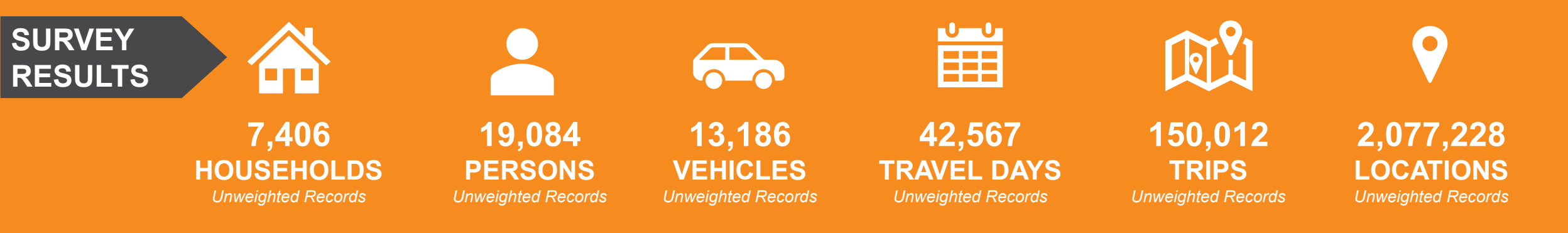
10+
Languages

Data Collection Summary



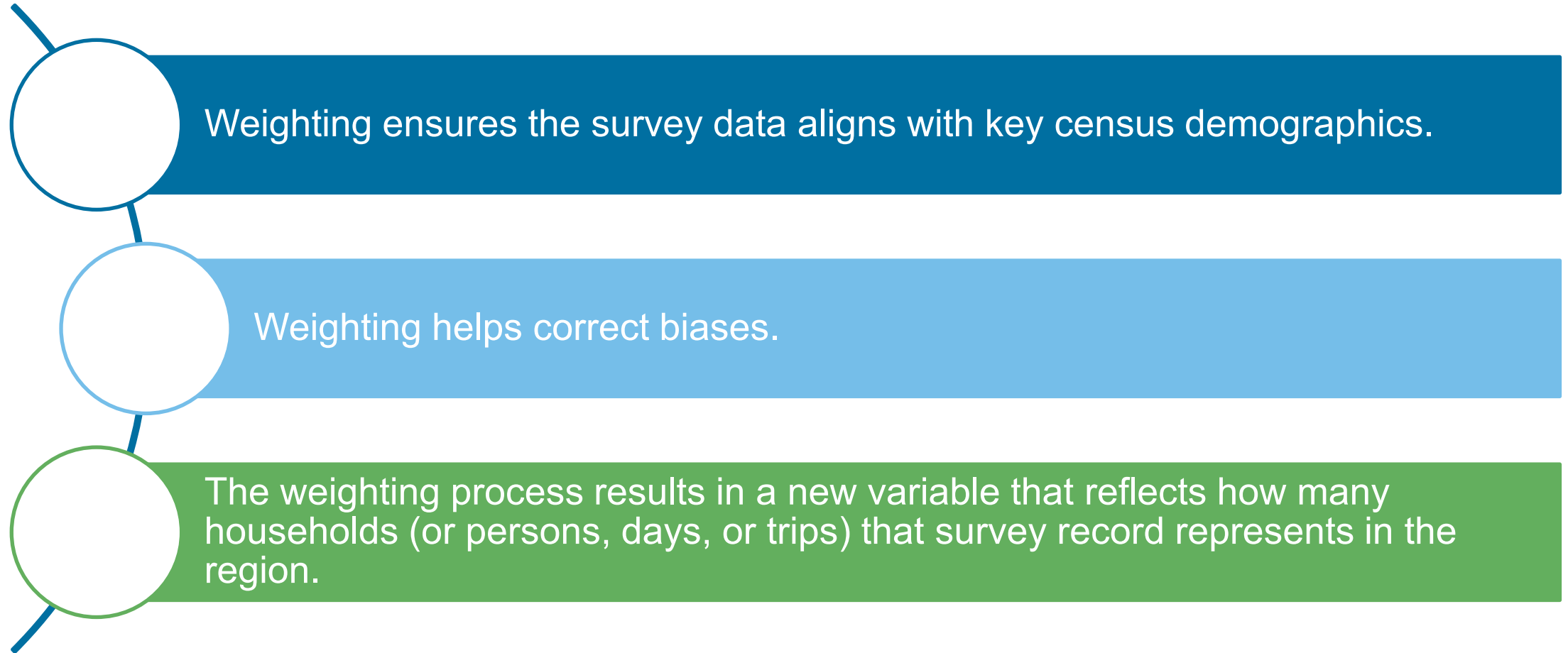


Data Collection Summary



- Smartphone participants completed up to a 7-day travel diary.
- Online and call center participants completed a 1-day travel diary.
- A proxy adult was asked to report travel for 1 day for children under age 18, regardless of participation mode.
- Same questionnaire was used for smartphone, online, and call center participants.
- Survey was available in English and Spanish, with call center support for additional languages.

Data Weighting Overview



Key Survey Results



Trip Analysis

PERSON TRIPS ON WEEKDAYS (TUESDAY – THURSDAY) BY COUNTY (UNWEIGHTED AND WEIGHTED)

COUNTY	UNWEIGHTED COUNT	WEIGHTED COUNT
Fresno	16,121	3,537,447
Kern	18,187	3,415,856
Kings	3,197	557,999
Madera	4,178	563,874
Merced	5,780	1,020,892
San Joaquin	12,811	2,638,982
Stanislaus	9,051	1,879,518
Tulare	9,184	1,925,916
TOTAL	78,509	15,540,485



Weekday Trip Rate

PERSON AND HOUSEHOLD WEEKDAY TRIP RATES BY COUNTY (WEIGHTED)

COUNTY (n = 78,509)	PERSON TRIP RATE	HOUSEHOLD TRIP RATE
Fresno (n = 16,121)	3.9	11.4
Kern (n = 18,187)	4.4	12.7
Kings (n = 3,197)	4.2	12.7
Madera (n = 4,178)	3.9	12.5
Merced (n = 5,780)	4.0	12.8
San Joaquin (n = 12,811)	3.8	11.5
Stanislaus (n = 9,051)	3.8	10.8
Tulare (n = 9,184)	4.3	13.7
TOTAL	4.0	12.0

Travel Mode

TRAVEL MODE BY COUNTY (WEIGHTED %)

COUNTY	FRESNO	KERN	KINGS	MADERA	MERCED	SAN JOAQUIN	STANISLAUS	TULARE	TOTAL
<i>Unweighted (n)</i>	16,121	18,189	3,197	4,178	5,780	12,811	9,051	9,184	78,509
Walk	6.2%	6.1%	7.3%	4.5%	6.7%	8.5%	7.5%	5.3%	6.6%
Bike or e-bike	1.1%	0.5%	0.1%	0.2%	0.2%	0.4%	1.2%	0.5%	0.6%
Taxi	0.0%	0.0%	0.1%	0.3%	0.0%	0.1%	0.1%	0.0%	0.1%
Smartphone-app ride hailing	0.1%	0.4%	0.6%	0.0%	0.3%	0.5%	0.1%	2.1%	0.5%
Vehicle	90.6%	91.2%	88.5%	93.9%	91.4%	88.6%	88.6%	88.4%	90.0%
School bus	0.5%	0.7%	1.2%	0.8%	0.1%	0.2%	0.2%	0.1%	0.4%
Shuttle	0.0%	0.1%	0.3%	0.0%	0.0%	0.1%	0.2%	0.3%	0.1%
Transit	0.6%	0.5%	1.0%	0.1%	0.6%	0.7%	1.5%	0.6%	0.7%
Long-distance passenger	0.0%	0.0%	0.0%	0.0%	0.0%	0.2%	0.0%	0.0%	0.1%
Other mode	0.9%	0.5%	0.9%	0.2%	0.6%	0.7%	0.7%	2.6%	0.9%
TOTAL	100%	100%	100%	100%	100%	100%	100%	100%	100%

Trip Purpose

TRIP PURPOSE BY COUNTY (WEIGHTED %)

COUNTY	FRESNO	KERN	KINGS	MADERA	MERCED	SAN JOAQUIN	STANISLAUS	TULARE	TOTAL
<i>Unweighted (n)</i>	16,121	18,189	3,197	4,178	5,780	12,811	9,051	9,184	78,509
Home	31.2%	30.9%	32.6%	31.1%	28.6%	32.5%	29.3%	27.9%	30.6%
Work	13.8%	14.2%	11.6%	12.9%	14.7%	13.5%	13.1%	13.5%	13.6%
School	4.7%	3.6%	5.7%	3.2%	6.7%	4.4%	3.5%	4.6%	4.3%
Pick up / Drop off	14.2%	15.5%	14.7%	15.4%	16.1%	13.6%	13.0%	20.9%	15.3%
Shopping	11.4%	11.6%	7.9%	12.1%	13.8%	10.7%	11.3%	10.9%	11.3%
Meal	7.8%	7.3%	7.4%	6.9%	5.3%	7.2%	8.2%	6.5%	7.3%
Social / Recreation	6.3%	6.9%	6.5%	5.3%	4.5%	6.7%	7.9%	6.0%	6.5%
Errand	4.5%	5.1%	8.1%	5.4%	4.3%	4.9%	6.9%	4.4%	5.1%
Overnight	3.6%	3.1%	2.1%	6.1%	3.9%	2.9%	3.1%	2.5%	3.2%
Other purpose	2.4%	1.9%	3.4%	1.6%	2.0%	3.5%	3.8%	2.8%	2.7%
TOTAL	100%	100%	100%	100%	100%	100%	100%	100%	100%



Telework Frequency

TELEWORK FREQUENCY BY COUNTY (WEIGHTED %, EMPLOYED ADULTS)

COUNTY	FRESNO	KERN	KINGS	MADERA	MERCED	SAN JOAQUIN	STANISLAUS	TULARE	TOTAL
<i>Unweighted (n)</i>	1,674	1,634	315	390	563	1,401	909	826	7,712
6-7 days a week	2.3%	3.9%	3.4%	2.9%	3.9%	4.0%	1.3%	4.0%	3.2%
5 days a week	11.8%	7.9%	6.1%	10.0%	12.1%	10.9%	6.8%	10.8%	9.8%
4 days a week	1.6%	2.2%	1.2%	8.5%	4.0%	3.6%	5.1%	2.6%	3.1%
2-3 days a week	10.1%	8.5%	2.7%	7.0%	9.6%	8.1%	10.5%	5.0%	8.5%
1 day a week	4.3%	3.2%	3.0%	3.6%	2.4%	3.2%	5.3%	7.2%	4.1%
1-3 days a month	3.2%	3.7%	1.1%	6.5%	2.0%	2.8%	3.1%	4.4%	3.3%
Less than monthly	6.8%	8.0%	7.2%	2.6%	7.3%	5.7%	6.2%	7.5%	6.7%
Never	60.0%	62.4%	75.3%	58.9%	58.7%	61.7%	61.7%	58.5%	61.2%
TOTAL	100%	100%	100%	100%	100%	100%	100%	100%	100%



Contacts

MICHELLE LEE
SENIOR DIRECTOR

Michelle.Lee@rsginc.com
+1 802 359 5591

MELANIE MUNROE
SENIOR CONSULTANT

Melanie.Munroe@rsginc.com
+1 802 295 4999

JACOB MOORE
LEAD ANALYST

Jacob.Moore@rsginc.com
+1 202-987-3718



www.rsginc.com