



Date: April 9, 2024

Honorable Mayor and Council Members:

Author and title: Alfred Knotts, Transportation Program Manager

Title: Truckee TART Connect Microtransit Pilot Program Update

Jen Callaway, Town Manager

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**Recommended Action:**

That the Town Council receive an update from Staff and LSC Transportation Consultants, Inc (LSC) on the Truckee TART Connect Microtransit Pilot Program(s).

**Background:**

In May 2022, Town Council voted to authorize the launch of a fare-free “TART Connect Microtransit Summer Pilot.” This initial pilot served the following “zones:”

*Tahoe Donner, Glenshire, and an east-west Commercial Core from the Truckee/Tahoe Airport and Truckee Donner Recreation Center to the East and Donner State Park to the West.*

Following the conclusion of the 2022 Summer Pilot, Council requested Staff return with a budget and service plan for Winter Pilot for the 22/23 winter season. A 2022/23 Winter Pilot Program was approved by Council on October 11, 2022 for a pilot period running from December 15, 2022 to April 15, 2023.

Given the ongoing success of the initial pilot programs, Council voted to extend the 2022/23 Winter Pilot Program beyond April 15, 2023 through June 30, 2023. As part of this action, Town voted to expand the service area to be inclusive of the Town Limits beyond the initial zones highlighted above.

On March 23, 2023, the Town Council voted to approve a Town-wide fare-free year-long pilot beginning on July 1, 2023, through June 30, 2024. At present time, the TART Connect Program is not funded beyond June 30, 2024. Staff is preparing to bring forward a budget request for Council consideration during the upcoming budget discussions. Currently this request contemplates the continuation of the Program through FY 24/25.

At a minimum it would be beneficial to extend the program to at least November 2024 to continue to provide TART Connect as a mobility option through peak summer and further evaluate feasibility of other sources of revenue. Should new revenue streams not be available and/or feasible this would allow for the necessary public outreach to riders should the service be discontinued.

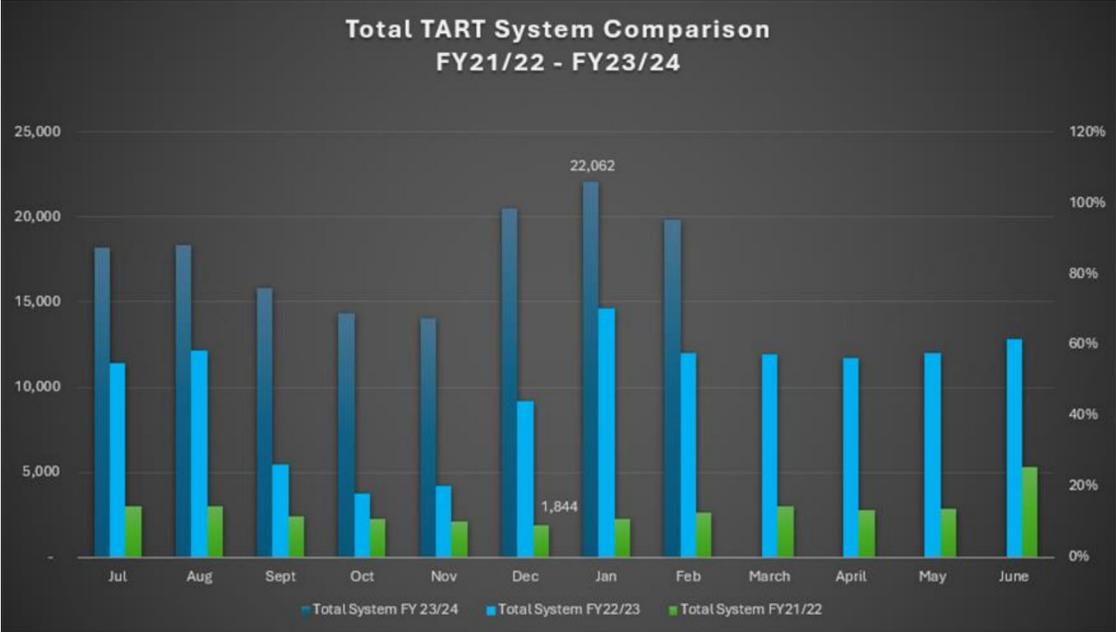
**Discussion:**

Concurrent with the FY 23/24 year-long pilot, Staff, with technical assistance from LSC, initiated a detailed analysis of the TART Connect Program. This analysis is intended to take a comprehensive review of the program over the life of the pilot program(s) and inform Council, as well as the public, on the overall performance of the program, including the customer experience. In conducting this effort, LSC reviewed all relevant qualitative and quantitative data, including transit industry performance measures (i.e. ridership, passengers per hour, cost per passenger, trip purpose, user profiles, etc.) as well as rider surveys.

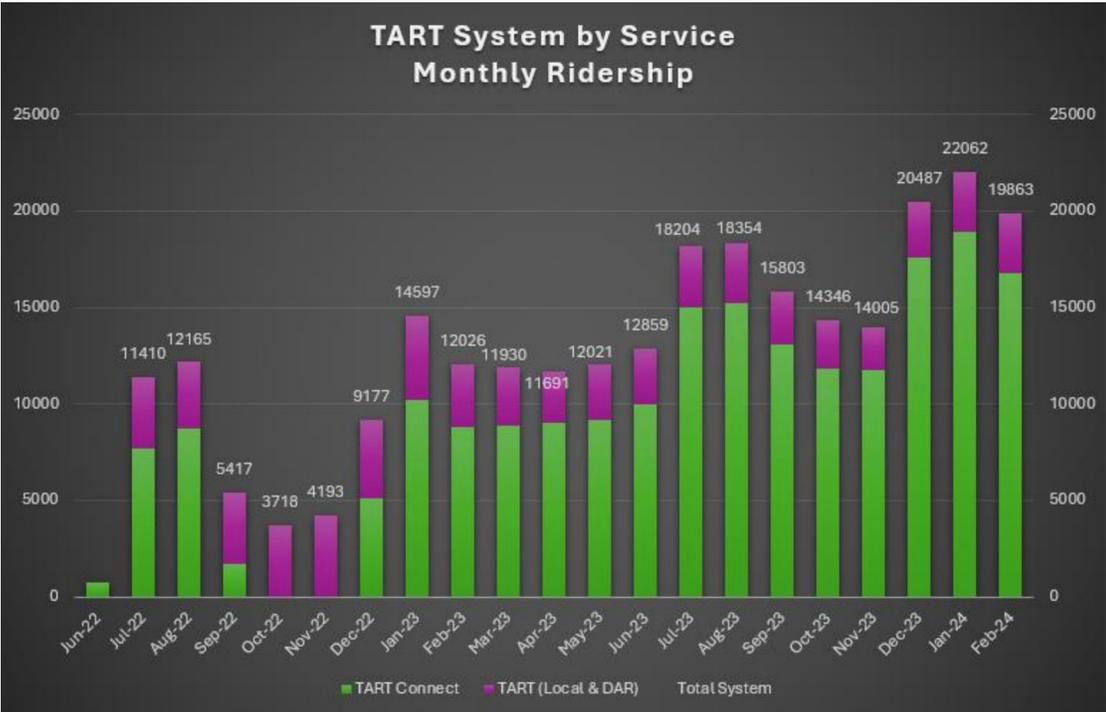
On April 9<sup>th</sup>, 2024, Staff and LSC will provide a detailed presentation to Council on the findings in “Truckee TART Connect Review” as well as answer any questions that might arise from Council as well as the public.

In advance of the meeting, Staff has provided a public draft of this report, included hereinto as Attachment A of this Staff Report. In addition to the attached Report, Staff has also provided a few program highlights below, as well as a “snapshot” of overall transit ridership by service type.

**Figure 1 and 2 – Annual Ridership and Monthly Ridership by Service Type**



Note: TART Connect Initial Pilot Launch was Late June 2021/22 through early September 2022/23 with Winter beginning mid-December.



Note: TART Connect Initial Pilot Launch was Late June 2021/22 through early September 2022/23 with Winter beginning mid-December.

### Service Performance and Ridership Trends

- Approx. 215,000 all-time passengers since June 2022!!
- Fairly consistent ridership by day of week, with highest summer ridership on Thursday (most likely due to Truckee Thursdays) and highest winter ridership on Saturday.
- Cost per passenger has decreased from \$22.21 from Summer 2002 Pilot to approx. \$10.60 for Winter 23/24 Pilot. For comparison purposes, Truckee Dial-A-Ride or Truckee Local Route, was \$75.88 per passenger trip and \$30.50 per passenger trip respectively.
- Winter experiences the highest ridership with 590 per day in winter 23/24 and 496 during summer 2023.
- The Downtown/Donner Pass Road Corridor one generates the majority of trip activity (56%).
- The average trip length was 3.0 miles in winter and 3.8 miles in summer.
- Average wait time after booking their trip was 26 minutes, ranging from a low of 22 minutes in summer 2023 to a high of 37 minutes in winter 2022-23.
- 60% of Rides are Shared, up from approximately 25% from initial launch
- Current net VMT impact is a small increase in total VMT (523 per day in winter and 1,127 per day in summer). With battery electric vans, however, the service will reduce net greenhouse gas emissions.
- TART Connect reduces parking demand downtown by 7 – 10 private vehicles per day in winter and 16 – 25 per day in summer.
- TART Connect increases overall mobility, serving about 35 trips per day that riders say otherwise would not have been made.
- TART Connect gets up to 65 workers to work and back each day, benefiting both workers and employers.
- With around 40 percent of trips to shopping and dining benefiting local sales tax

### Rider Experience and Service Quality

- Average customer experience rating on a scale of 1 to 5 is 4.9.
- Most riders are residents (56% to 61%) or second homeowners (18%). Overnight visitors made up 11% to 13% of riders and day visitors made up 2% to 4%.
- On a scale of 1 to 10, average support is 9.3 for summer and winter service and 9.0 for spring/fall service.
- Top reasons people ride TART Connect are to avoid driving after drinking (46%), avoid parking hassles (41%), and to access recreation/events (34%)
- When asked on a scale of 1 to 10 how likely they would be to recommend Truckee TART Connect to a friend, 96% indicated 5 or above, and 76% indicated 9 or 10.

### Future of TART Connect

In preparation for the upcoming fiscal year, staff is preparing to include a Capital Improvement Program (CIP) budget for the continuation of the TART Connect service through FY 2024/25. This request would contemplate continuation of the Program at its current level of service.

Should the service be continued into FY 24/25, the following service considerations could be implemented to reduce costs as well as improve system efficiencies:

- Establish a 0.25-mile minimum trip distance for non-ADA trips.
- Creation of one or more zones (i.e. Downtown/DPR Corridor, Glenshire)
- Reduce peak season hours from midnight to 10:00 PM for weekdays.

**Recommendation:**

Staff would recommend that Council provide feedback and/or direction regarding the continuation of the TART Connect program into FY 24/25, and any service model changes, which can be incorporated into the CIP development process. Should Council elect to continue TART Connect into FY24/25, staff would continue to identify future funding sources to sustain the service.

Alternatively, this feedback could be provided during the upcoming April 23, 2024, Budget workshop.

**Priority:**

- |   |  |  |
|---|--|--|
| <input type="checkbox"/> Enhanced Communication               | <input checked="" type="checkbox"/> Climate and Greenhouse Gas Reduction | <input type="checkbox"/> Housing                 |
| <input checked="" type="checkbox"/> Infrastructure Investment | <input type="checkbox"/> Emergency and Wildfire Preparedness             | <input checked="" type="checkbox"/> Core Service |

**Fiscal Impact:**

Inclusive of all TART Connect Pilot Programs, approximately Three Million Nine Hundred Seventy-Three Thousand, Seven Hundred and Eleven Dollars (\$3,973,711) has been expended on the TART Connect Pilot Program operations while approximately \$26,300 is budgeted for the “TART Connect Review Report” included in Attachment A. Continuation of the current TART Connect Program into FY 2024/25 could result in an expenditure of approximately \$2,600,000.

**Public Communication:**

In addition to the posting of the Council Agenda and this staff report, the following public communications have occurred:

- Town Council Truckee TART Connect Program presentations on November 9<sup>th</sup>, 2021, March 8<sup>th</sup>, 2022, August 9, 2022, January 24, 2023, February 14, 2023, March 14, 2023, and May 23, 2023.
- Additionally, continuation of the TART Connect program was discussed in detail as part of the January 26, 2023 FY 23/24 Work Plan and Priorities Council Workshop.
- Presentations were also provided to and received by Visit Truckee Tahoe Board of Directors on February 23, 2023, May 18<sup>th</sup>, 2023, January 18, 2024, and Good Morning Truckee on February 16, 2024.

**Attachments:**

Attachment A – Draft LSC Report titled “Truckee TART Connect Review Report” Dated March 18, 2024

# **ATTACHMENT A**



# Truckee TART Connect Review

*Prepared for the*  
**Town of Truckee**

March 18, 2024

Prepared by LSC Transportation Consultants





# Truckee TART Connect Review

*March 18, 2024*

*Prepared for*

Town of Truckee  
10183 Truckee Airport Road  
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*Prepared by*

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## INTRODUCTION

A growing number of public transit agencies across the United States now offer “microtransit” service. Microtransit applies the app-based technology developed for transportation network companies (such as Uber and Lyft) to provide real-time, on-demand transit service. Typically, passengers use an app downloaded on their smartphone or computer to request and pay for their microtransit ride, then a routing algorithm assigns the ride request to a specific driver/vehicle. Microtransit is a shared-ride service, meaning multiple passengers may ride in one vehicle at any given time. Microtransit has become a popular alternative for providing transit coverage over areas that are difficult, if not impossible, to serve efficiently with fixed routes.



The Town of Truckee’s microtransit service is referred to as the Truckee Tahoe Area Regional Transit (TART) Connect. The Town, inspired by the successful microtransit program operated by Placer County on the north and west shores of Lake Tahoe, introduced the Truckee TART Connect as a demonstration project in the summer of 2022. The Truckee TART Connect pilot was well received by the community, prompting Town officials to extend and expand the service. Currently, funding has been allocated for the microtransit program through the spring of 2024, with the majority of funding coming at the discretion of the Town Council in the form of Town general funds.

This study reviews the Truckee TART Connect service from the initial summer 2022 pilot through the winter 2023-24 season, with a focus on 2023 operations. Chapter 2 describes the Truckee TART Connect service characteristics. Operations and performance data are presented in Chapter 3. Chapter 4 summarizes passenger feedback collected through email and in-app surveys, while Chapter 5 reviews general public feedback collected through a community-wide, online survey effort. Chapter 6 includes an analysis of how the Truckee TART Connect has affected Vehicle Miles Traveled (VMT) and parking demand within the Town, as well as a discussion of other benefits generated by the service. Finally, Chapter 7 provides a summary of key findings to be considered when determining the long-term role of the Truckee TART Connect as a transportation alternative within the Town. Chapter 7 also presents both short- and long-term strategies to improve the Truckee TART Connect service.

## BACKGROUND

The Town of Truckee undertook a microtransit demonstration project and subsequent review of microtransit service in the summer of 2022. This effort was developed based on multiple considerations specific to Truckee:

- Many of Truckee’s residents live in low-density subdivisions dispersed across the Town’s 33.7 square miles. It is difficult and costly to serve residents living outside the core areas with traditional fixed route service. The challenges of operating fixed routes in Truckee were noted in the *2017 Eastern Nevada County Short Range Transit Development Plan*.

- Given the difficulties of serving the dispersed Truckee population, the existing Truckee TART services – a single fixed route and associated Dial-a-Ride (DAR) service - are relatively inefficient and serve only a small proportion of overall travel, with passengers being primarily those who are transit dependent.<sup>1</sup>
- It is difficult to scale the fixed route and DAR service levels to meet seasonal demand, limiting potential ridership by tourists and seasonal workers.
- The Town of Truckee is actively working to improve the community’s overall sustainability and to reduce the environmental impacts of both residents and visitors alike, including multiple efforts to reduce VMT and associated greenhouse gas emissions.

Following a competitive procurement process, the Town of Truckee contracted with a private “turnkey” operator (Downtown, Inc.) to operate the summer 2022 demonstration microtransit service<sup>2</sup> over limited areas. LSC Transportation Consultants, Inc. was retained to assist in the design of the demonstration service as well as to conduct a broader study to assess the potential performance of a Truckee microtransit service during other periods of the year and throughout a wider expanse of the community. This study also included an assessment of how the existing Truckee TART services could be modified to create a combined transit program incorporating microtransit. This effort resulted in the *Truckee Microtransit Study (2023)*.

The summer 2022 pilot microtransit project ended on September 5, 2022. The Town of Truckee then initiated a winter pilot service on December 15, 2022. On March 14, 2023, the Town Council approved an extension of the service until June 30, 2023. During this meeting, the Town Council also approved expanding the service hours to 6:30 AM to 10:00 PM and the service area to include the entirety of Town limits. Later, the Town Council approved another extension of the Truckee TART Connect service until June 30, 2024. At this later meeting, the service hours were revised to be as follows:

- Summer and Winter – 6:30 AM to Midnight
- Spring and Fall – 6:30 AM to 10:00 PM

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<sup>1</sup> Note that Placer County separately operates the Placer TART routes serving Truckee via SR 89 to Olympic Valley and Tahoe City as well as via SR 267 to Northstar and Kings Beach. These Placer County routes are not the subject of this study.

<sup>2</sup> No changes have been made to other Truckee TART services since the introduction of the Truckee TART Connect.

## TRUCKEE TART CONNECT SERVICE CHARACTERISTICS

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### INTRODUCTION

This chapter provides a summary of the Truckee TART Connect’s service characteristics.

### SERVICE CHARACTERISTICS

#### Span of Service

The initial pilot project was operated from June 25 to September 5, 2022. During this 73 day period, the Truckee TART Connect was operated seven days a week from 10:00 AM to 10:00 PM.

Truckee TART Connect service resumed for the winter season on December 15, 2022, with the service available seven days a week from 8:00 AM to 10:00 PM.

In March 2023, the Truckee TART Connect was extended by the Truckee Town Council through June 30, 2023. It was decided that the service would continue to be available seven days per week. The hours were extended to be 6:30 AM to 10:00 PM.

In June 2023, the Truckee TART Connect was extended by the Truckee Town Council through June 30, 2024. The Town Council approved funding to operate the service 7 days per week during the additional year. During peak seasons (July 1 through September 4, 2023, and December 14, 2023 through April 7, 2024), service will be available from 6:30 AM to 12:00 AM. During off-peak seasons (September 5 through December 13, 2023 and April 8 to June 27, 2024), service will be available from 6:30 AM to 10:00 PM.

#### Service Area

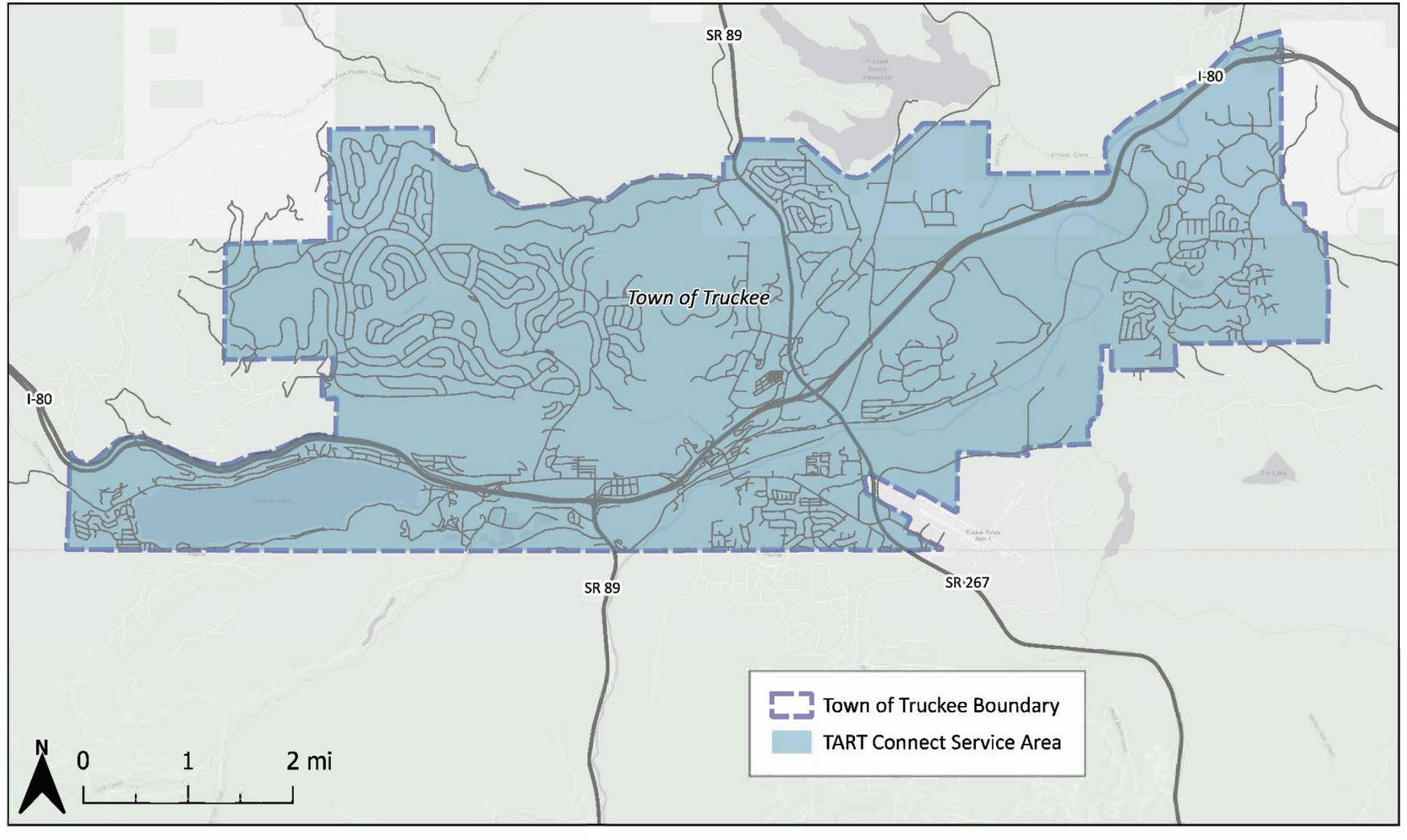
The service area for the initial summer 2022 pilot is shown in Figure 1. As shown, the initial service area included the Tahoe Donner neighborhood, the Glenshire neighborhood, downtown Truckee, the Brockway/267 corridor to the airport, the Crossroads Center along State Route (SR) 89 South, and the Recreation Center along Truckee Way. This service area excluded substantial portions of Truckee, including the Ponderosa Palisades area, the Prosser/Lakeview area, and Donner Lake, among other neighborhoods. In March 2023, the Truckee Town Council expanded the Truckee TART Connect service area to include all of the Town limits. The current service area is shown in Figure 2.

#### Fare

Truckee TART Connect is currently a fare-free service.



Figure 2  
Current Truckee TART Connect Service Area



## **Rules and Policies**

In addition to standard passenger policies, there are additional rules specific to the Truckee TART Connect. During trips, no detours from the booked destination are allowed. Passengers must be on time; drivers will wait for 3 to 5 minutes before reporting the ride as being missed/no-show. Passengers may be suspended from their Truckee TART Connect account if they have too many missed/no-show rides. At the discretion of the driver, “well-behaved” dogs are allowed on the service in order to remove a barrier to recreation trips, such as those to trailheads or parks, for which people may want to travel with their dogs. Bicycles, skis, and snowboards can all be accommodated on all of the vehicles.

There is currently no policy regarding the minimum length of trip able to be served.

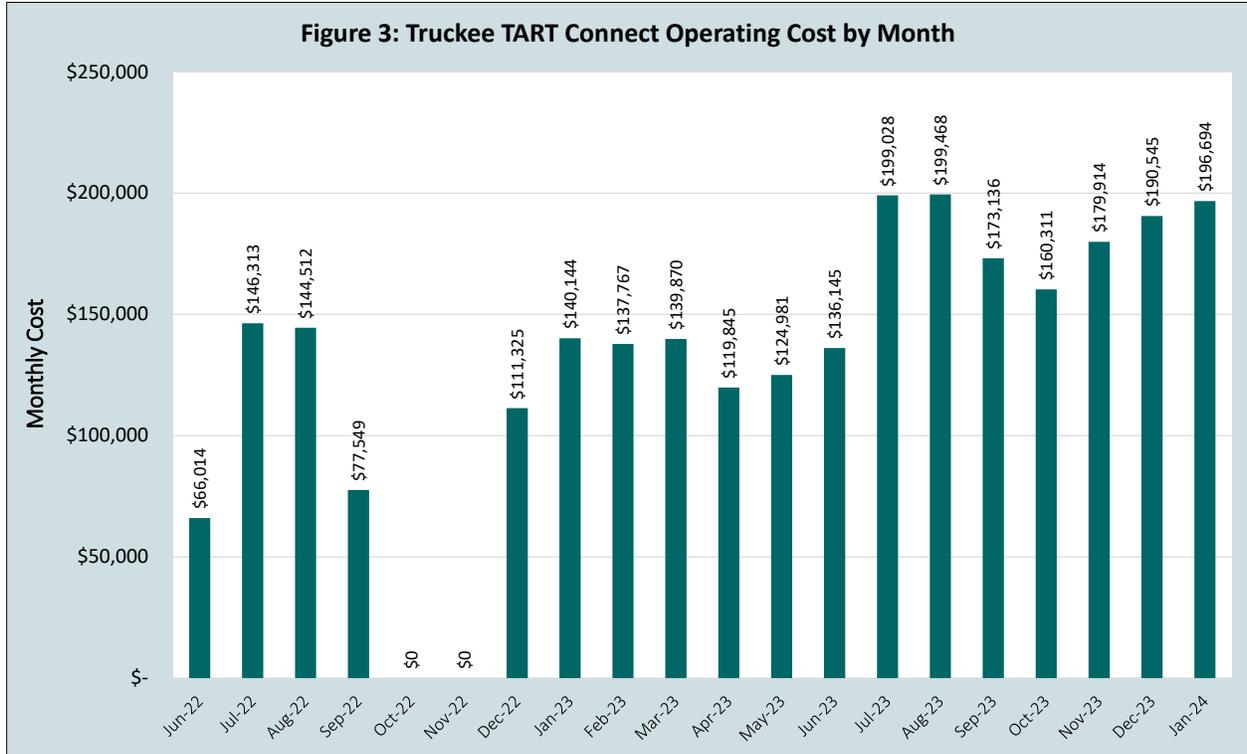
## **Service Provider and Cost**

The Town of Truckee contracts with Downtowner, Inc. (Downtowner) to provide microtransit service. Downtowner operates microtransit programs in multiple mountain resort communities, including Aspen, Colorado, Park City, Utah and the South Shore of Lake Tahoe. For the Truckee TART Connect service, Downtowner provides all vehicles (including maintenance), drivers, and dispatch/management staff. Downtowner also provides the mobile application for passengers to schedule trips, see their estimated pickup time, and track the arriving vehicle. The Town pays Downtowner monthly; each month, the Town pays a fixed cost as well as additional costs dependent on the number of hours and miles operated. Starting in September 2023, Downtowner began fueling the microtransit fleet at the Town of Truckee Public Works facility, yielding cost savings for both the Town and Downtowner.

Overall, the Truckee TART Connect service required \$2.64 million in operating costs from June 2022 through January 2024. Figure 3 details the total cost paid to Downtowner by month, with the exception of the period during the fall of 2022 when service was paused. While more months will need to be analyzed to discern clear trends, so far costs have been relatively high in costs during the peak winter and summer seasons and relatively low in the off-peak seasons. The summer months of July and August 2023 saw the highest operating costs to date, followed closely by January 2024. Other financial metrics of the Truckee TART Connect, such as cost per passenger-trip and cost per service hour, are discussed in Chapter 3.

## **Vehicles/Facilities**

During the initial pilot, the microtransit fleet consisted of eight vehicles (up to seven in active service and one spare). The fleet size was reduced to five vehicles during the winter 2022-23 season. Since the spring 2023 season, service has been provided using a fleet of nine passenger vans (eight active and one spare), each with seating capacities of six to nine passengers. Up to nine vehicles are operated at peak times. All the vans are accessible for Americans with Disabilities Act (ADA) passengers and equipped with bicycle and ski/snowboard racks. The Town provides overnight parking for the fleet, as well as office space for Downtowner staff.



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## TRUCKEE TART CONNECT PERFORMANCE ANALYSIS

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### INTRODUCTION

Evaluating a transit service’s performance helps to determine whether the service is meeting community needs, as well as whether public funds are being used effectively. This chapter discusses Truckee TART Connect operations and performance from June 2022 through January 31, 2024. For the analyses presented in this chapter, the seasons were defined as follows:

- Summer 2022 – June 25 through September 5, 2022 (the initial pilot phase)
- Winter 2022-23 – December 15, 2022, through March 31, 2023
- Spring 2023 – April 1 through June 30, 2023
- Summer 2023 – July 1 through August 31, 2023
- Fall 2023 – September 1 through November 30, 2023
- Winter 2023-24 – December 1, 2023, through January 31, 2024.

### RIDERSHIP

#### Ridership by Season

While Truckee is year-round community, second home occupancy and visitor activity is highest in the peak winter and summer tourism seasons. Based on this tourism pattern, it would be expected that Truckee TART Connect ridership would be greatest during the peak seasons, when there are more people in town, and lower during the off-peak seasons of spring and fall.

Table 1 shows how Truckee TART Connect ridership has varied by season and month since June 2022. During the first five consecutive seasons of operations (winter 2022-23 through winter 2023-24), total ridership followed the anticipated seasonal pattern, rising during peak seasons and dropping in subsequent off-peak seasons. While this initial trend suggests tourism is influencing ridership, the relatively small drops in ridership in the offseasons reflects the high proportion of resident ridership.

In addition, some of the variation in ridership can be attributed to the differing number of days of service in each season. To better compare the different seasons, the average number of passenger-trips carried per day is also presented. While the average number of passenger-trips completed per day stayed almost unchanged from winter 2022-23 to spring 2023 (309 versus 310), it should be noted that snow and poor road conditions had a measurable impact on how many passengers could be served per day during the winter. There were also only five vehicles used in peak service during winter 2022-23 compared to nine during spring 2023, limiting potential productivity. Ridership greatly increased during summer 2023, when an average of 497 passenger-trips were carried per day, before then decreasing again during the fall 2023 season during which only 403 passenger-trips were carried per day. Winter 2023-24 ridership has surpassed all previous seasons thus far, with an average of 589 passenger-trips carried per day or 46 percent more passenger-trips per day than observed during fall 2023.

**Table 1: Truckee TART Connect Ridership by Season and Month**

Month	Total Passengers	Average Passengers per Day
<b>Summer 2022</b>		
June	776	129
July	7,714	249
August	9,354	302
September	1,712	342
<b>Full Season</b>	<b>19,556</b>	<b>268</b>
<b>Winter 2022-23</b>		
December	5,089	299
January	10,242	330
February	8,885	317
March	8,911	287
<b>Full Season</b>	<b>33,127</b>	<b>310</b>
<b>% Change From Previous Season</b>		<b>16%</b>
<b>Spring 2023</b>		
April	9,062	302
May	9,169	296
June	9,990	333
<b>Full Season</b>	<b>28,221</b>	<b>310</b>
<b>% Change From Previous Season</b>		<b>0%</b>
<b>Summer 2023</b>		
July	15,607	503
August	15,219	491
<b>Full Season</b>	<b>30,826</b>	<b>497</b>
<b>% Change From Previous Season</b>		<b>60%</b>
<b>% Change From Previous Year (July, August)</b>		<b>81%</b>
<b>Fall 2023</b>		
September	13,127	438
October	11,809	394
November	11,766	392
<b>Full Season</b>	<b>36,702</b>	<b>403</b>
<b>% Change From Previous Season</b>		<b>-19%</b>
<b>Winter 2023-24<sup>1</sup></b>		
December	17,567	567
January	18,980	612
<b>Full Season</b>	<b>36,547</b>	<b>589</b>
<b>% Change From Previous Season</b>		<b>46%</b>
<b>% Change From Previous Year (December, January)</b>		<b>87%</b>

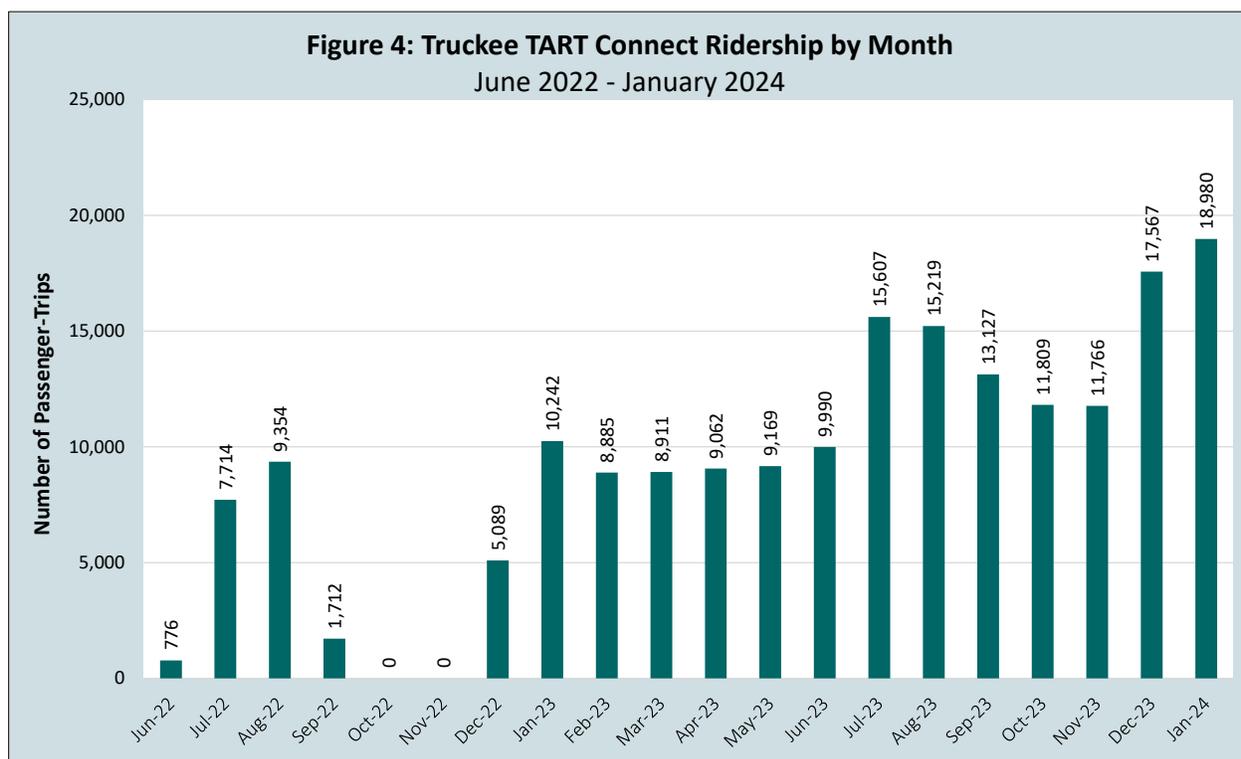
Source: LSC Transportation Consultants, Inc. based on Downtowner data.

Note 1: Winter 2023-24 data only includes ridership through January 31, 2024.

Year-over-year trends in ridership can be compared for the summer and winter seasons. Focusing on the peak summer months of July and August, 2023 average daily ridership was 81 percent higher than 2022 ridership. Looking at the winter months of December and January, 2023-24 average daily ridership was 87 percent higher than the previous winter. While these increases can be attributed in part to the expanded service area and hours, the strong growth in ridership year-over-year indicates that a greater number of residents and visitors know of and use the microtransit service compared to the initial pilot phase in 2022.

### Ridership by Month

Figure 4 shows Truckee TART Connect ridership by month. During the initial summer season, ridership progressively increased month over month as the service became more popular. Ridership was low in June and September 2022 because the service was not available for the entirety of these months. January saw the greatest ridership of any month during the winter 2022-23 season (10,242 trips). From February to May 2023, approximately 8,900 to 9,200 passenger-trips were served per month. Ridership then increased during the summer 2023 season, when over 15,200 passenger-trips were carried per month. Fall 2023 saw ridership drop compared to the peak summer season, with just over 11,700 passenger-trips carried per month. Ridership then increased again during the winter 2023-24 season, during which over 17,500 passenger-trips were carried per month. The greatest monthly microtransit ridership, so far, was observed in January 2024 (18,980 trips).



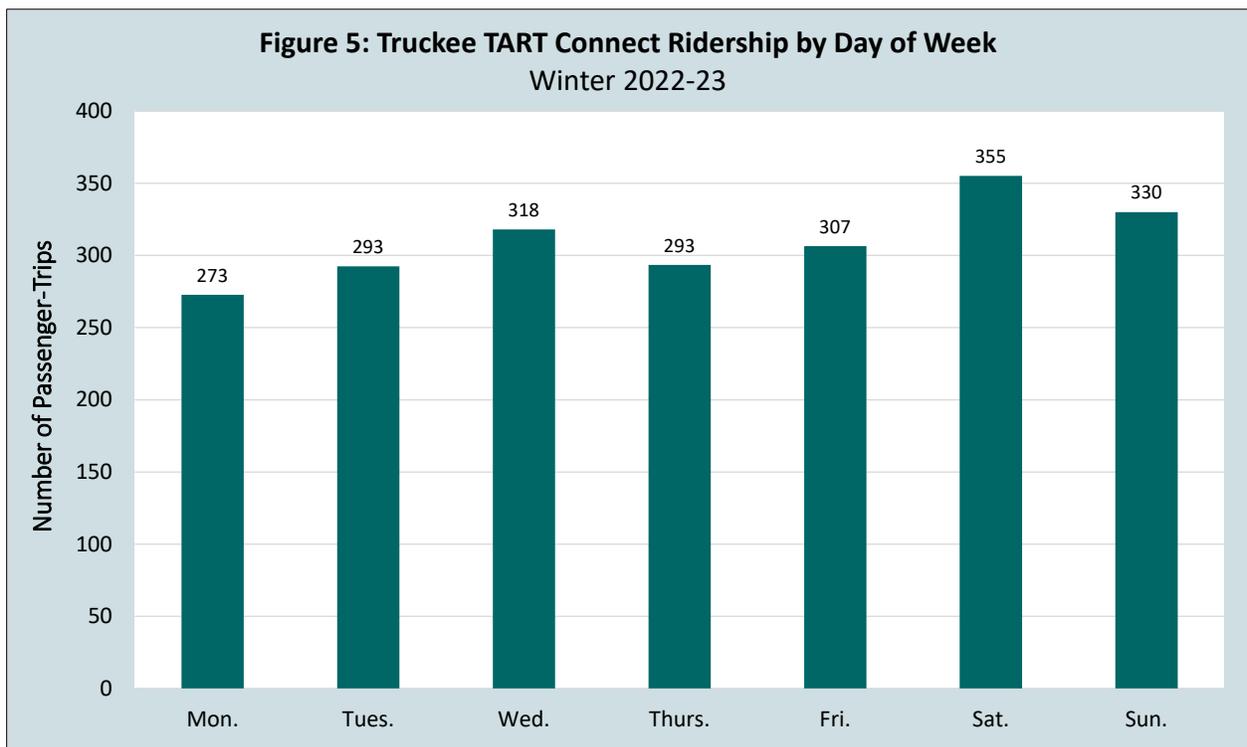
## Ridership by Day of Week During Peak Seasons

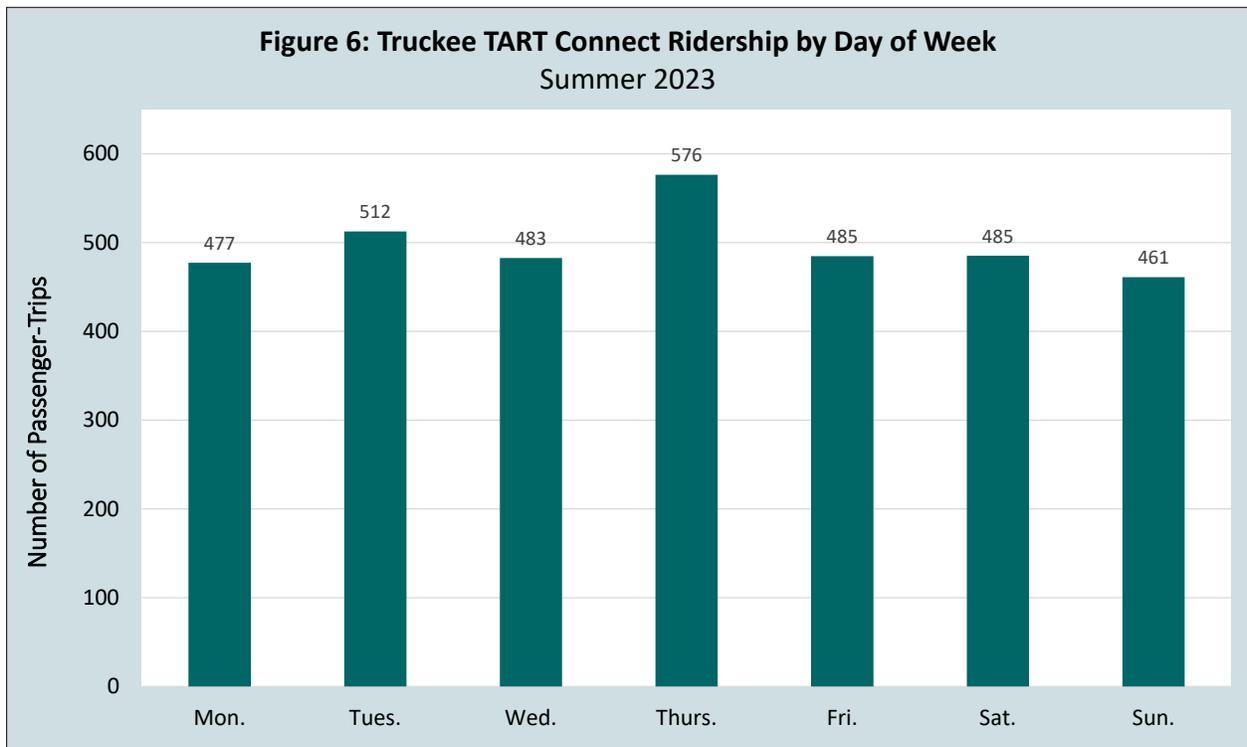
### **Winter**

Figure 5 shows how Truckee TART Connect ridership varied by day of week during the winter 2022-23 season. Overall, winter ridership was higher on weekends and lower on weekdays. By specific day, ridership was lowest on Mondays (273 daily passenger-trips) and highest on Saturdays and Sundays (355 and 310 daily passenger-trips, respectively).

### **Summer**

During the summer 2023 season, Truckee TART Connect daily ridership was greater during the mid-week and lower on the weekends (Figure 6). More specifically, ridership was lowest on Sundays (461 daily passenger-trips) and highest on Thursdays (576 daily passenger-trips). The pronounced Thursday ridership spike of 50 to 100 additional passenger-trips is probably due in large part to the Truckee Thursdays community event in Downtown Truckee.





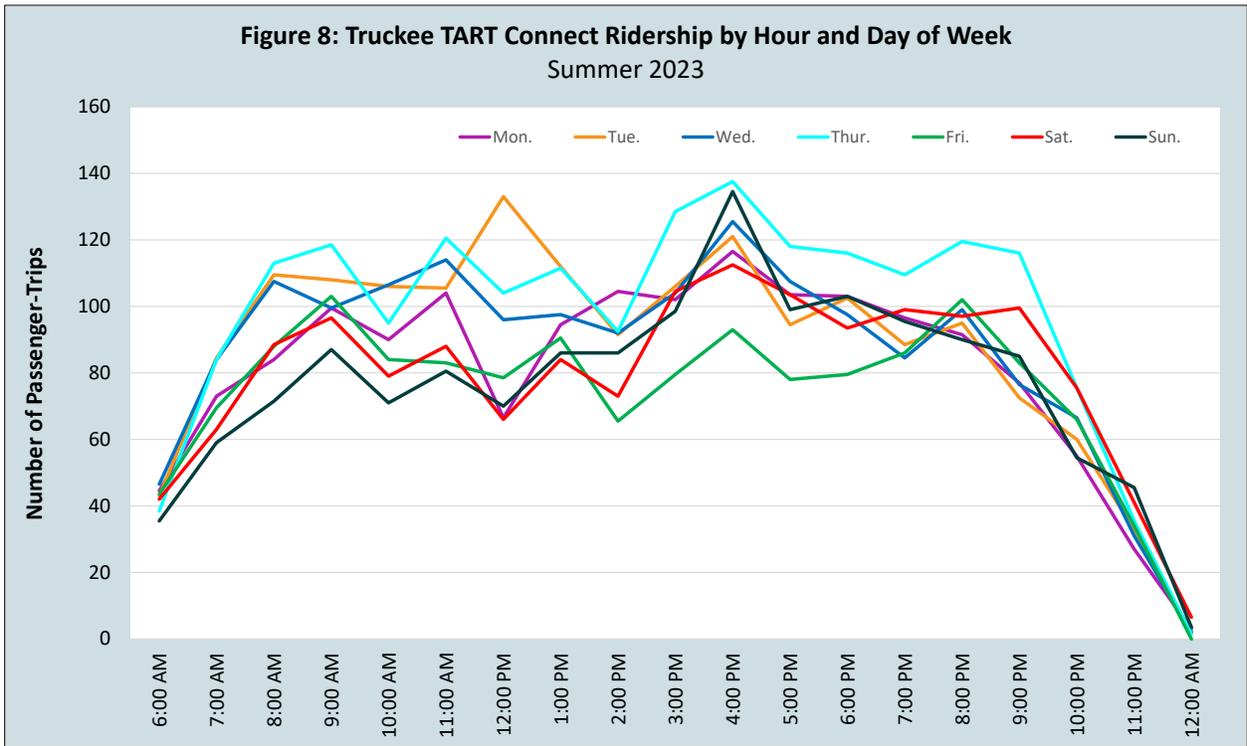
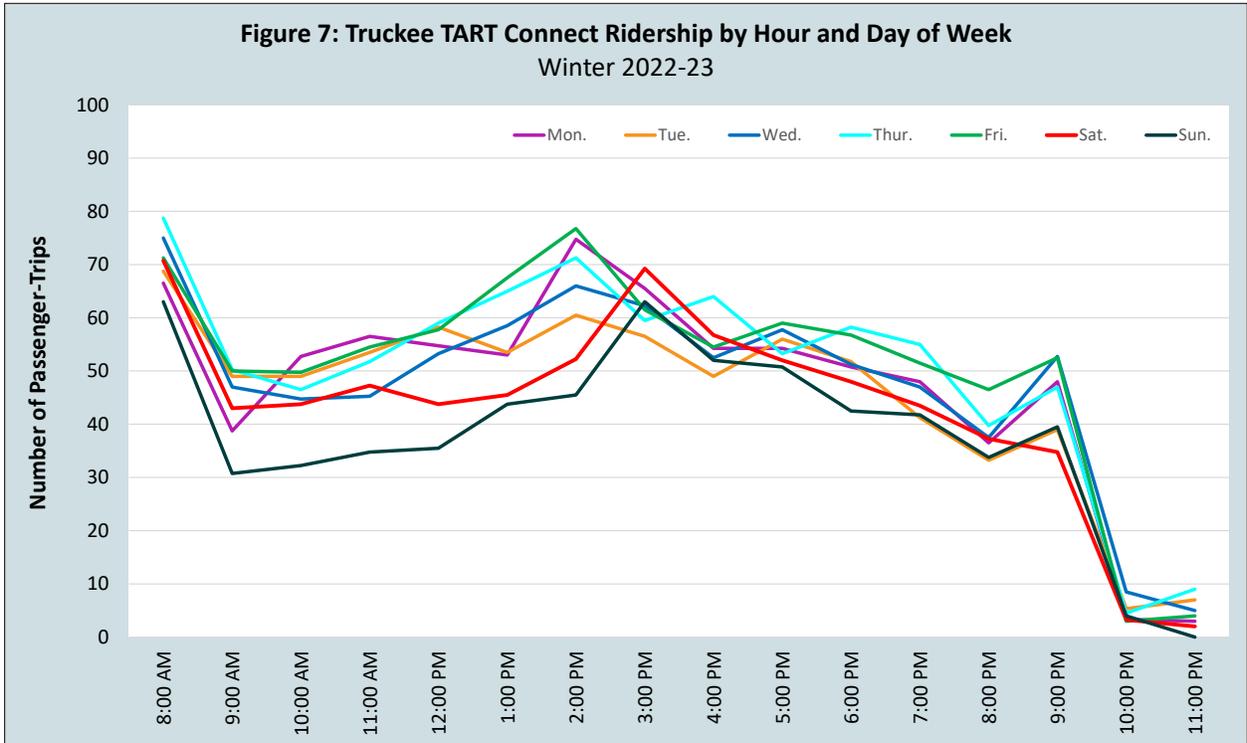
### Ridership by Hour and Day of Week

#### *Winter Season*

A review of winter 2022-23 ridership by hour and day of week is shown in Figure 7. As seen in the figure, hourly ridership followed a similar pattern each day of the week; there was a large volume of ridership during the first hour of the service day (8:00 AM to 9:00 AM), before ridership levels dropped during the later morning. There was then an early afternoon peak (1:00 PM to 3:00 PM), before ridership gradually dropped throughout the rest of the service day. While there was another increase in ridership from 9:00 PM to 10:00 PM, this peak was smaller in volume, with only 40 to 60 passenger-trips being served during the hour versus near 80 per hour earlier in the day. No more than 10 passenger-trips were served per hour during the final two hours of service on any day of the week.

#### *Summer Season*

Figure 8 shows Truckee TART Connect ridership by hour and day of week during the summer 2023 season. Reflecting the earlier service start time implemented for the summer season (6:30 AM) compared to the winter (8:00 AM), modest ridership was seen in the 6:00 AM hour and substantial ridership seen in the 7:00 AM hour, making the 8:00 AM ridership peak less pronounced. Ridership followed a similar general pattern throughout the week: ridership gradually increased throughout the morning, reaching a peak in the 4:00 PM hour, declined gradually until the 9:00 PM hour, then rapidly decreased later in the night. It is worth noting that ridership in the 10:00 PM and 11:00 PM hours was substantially higher in summer than in winter due to the later end time (midnight). The impact of Truckee Thursdays is evident in Figure 8; Thursday ridership increased significantly beginning in the 3:00 PM hour and remained high until the 9:00 PM hour.



## **Trip Origin and Destination Patterns**

The Downtowner app provides detailed geographic information regarding trip origins and destinations. To better understand travel patterns, the Truckee TART Connect service area was split into nine service zones: Downtown, Hospital, Donner Lake, Tahoe Donner, Pioneer Trail, Pioneer View Estates, Old Greenwood/Grey Crossing, Glenshire, and Sierra Meadows. These zones are shown in Figure 9. Trip origin and destination data for the most recent winter and summer seasons are summarized below by zone.

### ***January 2023***

Table 2 details origin/destination data for January 2023. This table reflects that service was limited to the area shown in Figure 1 (Chapter 2), with the exception of minor expansions to serve the Pioneer Trail and the Estates Drive areas. The Donner Lake, Old Greenwood/Greys Crossing, and Prosser Lakeview Estates zones were not yet included in service area during the winter 2022-23 season, therefore there were either no or very few trips to or from these zones. A review of the data in Table 2 indicates the following:

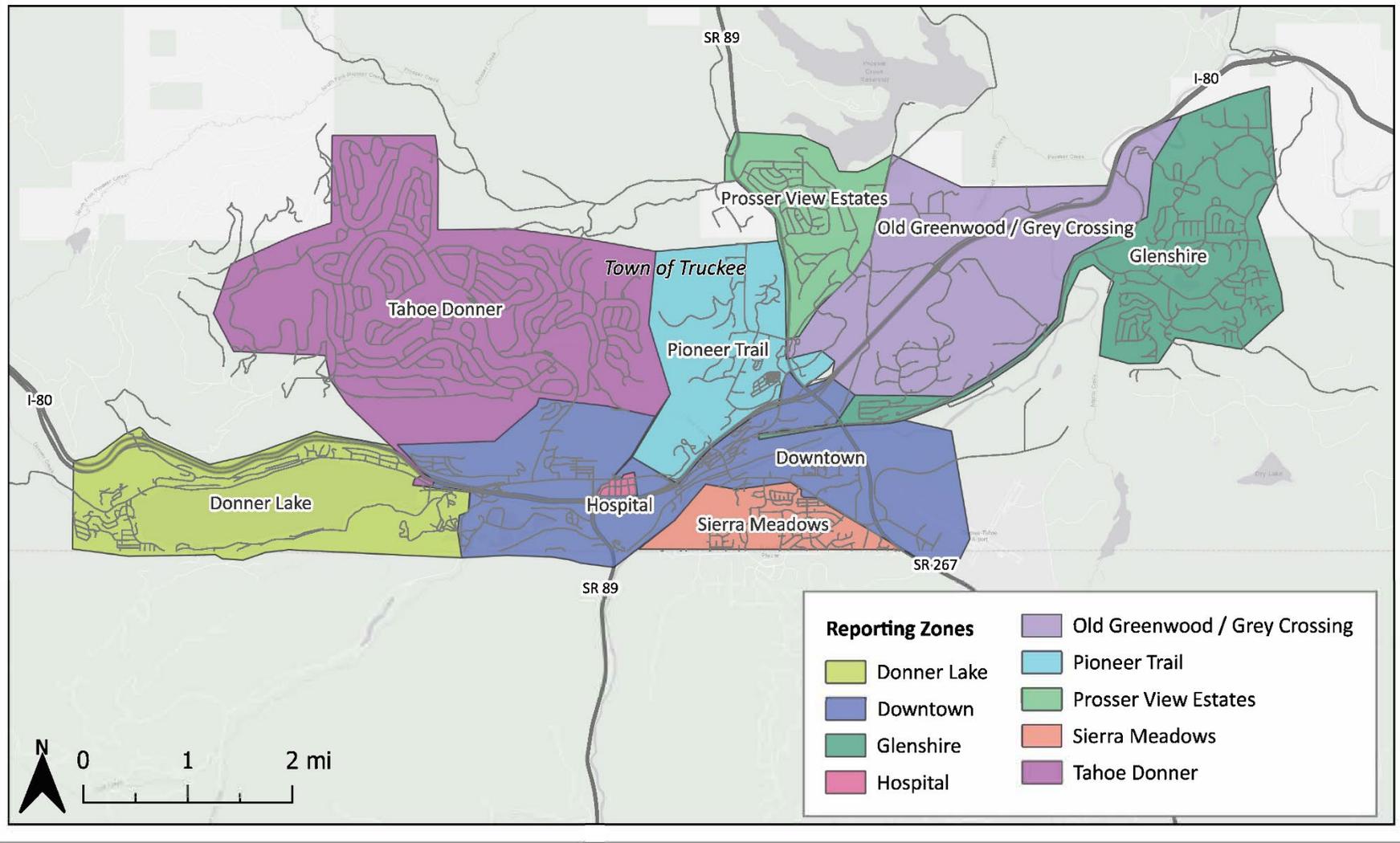
- Many of the January trips were made within the Downtown zone (30 percent), within the Tahoe Donner Zone (29 percent) or between the Downtown and Tahoe Donner zones (25 percent). None of the other origin/destination trip pairs generated more than 6 percent of trips.
- Comparing the number of total trip-ends (both origins and destinations) occurring within the zone allows the overall transit trip activity of each zone to be analyzed. Almost half (49 percent) of all trip-ends during January 2023 were within the Downtown zone, followed by 42 percent in the Tahoe Donner zone. Demand in other zones was much lower, with the next highest activity (4 percent of trip-ends) in the Glenshire zone.
- Activity can also be considered based on the proportion of trips where one or both of the trip-ends were within the zone. Reviewing this datapoint also shows the popularity of the Downtown zone, in which 68 percent of trips either started, ended, or were entirely within the zone. This was followed closely by the Tahoe Donner zone (56 percent). 7 percent of trips were in the Glenshire Zone, 5 percent in the Pioneer Trail zone, and 4 percent in the Hospital zone.
- Figure 10 shows heat maps indicating the areas of high pick-up and drop-off activity across Truckee, as provided by Downtowner. These maps provide an understanding of trip generation at a finer geographic level. Figure 10 further supports the data presented in Table 2, showing relatively high boarding and alighting activity in the historic Downtown area, the commercial centers along Donner Pass Road and at Crossroads Center, the recreational areas within Tahoe Donner, the hospital area, as well as specific multifamily housing complexes.

### ***July 2023***

The origin/destination data for July 2023 presented in Table 3 reflects that service was expanded to include the entire town limits. The data indicates the following:

- By individual origin/destination pair, trips within the Downtown zone were 30 percent of all trips. Beyond this consistency with the winter travel patterns, summer trips were more dispersed comparatively. The next highest proportion of trips occurred between Downtown and Tahoe Donner (15 percent), followed by trips between the Downtown and the Pioneer Trail zones (10 percent) and between the Downtown and Glenshire zones (8 percent).

Figure 9  
Truckee TART Connect Reporting Zones



**Table 2: Truckee TART Connect Trip Origin/Destination Data - January 2023**

One-Way Passenger-Trips										
Trip Origin Zone	Trip Destination Zone									
	Donner Lake	Downtown	Glenshire	Hospital	Old Greenwood / Grey Crossing	Pioneer Trail	Prosser Lakeview Estates	Sierra Meadows	Tahoe Donner	Total
Donner Lake	0	1	0	0	0	0	--	0	0	1
Downtown	0	1,848	185	73	0	132	--	21	792	3,051
Glenshire	0	157	13	8	0	9	--	7	14	208
Hospital	0	81	9	0	0	5	--	0	24	119
Old Greenwood / Greys Crossing	0	2	0	0	0	0	--	0	0	2
Pioneer Trail	0	125	7	3	0	1	--	1	3	140
Prosser Lakeview Estates	--	--	--	--	--	--	--	--	--	0
Sierra Meadows	0	34	11	0	0	0	--	0	4	49
Tahoe Donner	0	751	14	49	0	8	--	3	1,767	2,592
<b>TOTAL</b>	0	2,999	239	133	0	155	0	32	2,604	6,162

Total in Both Directions												
Zone	Zone										Total Trip-Ends	Total Trips With 1 or Both Ends in Zone
	Donner Lake	Downtown	Glenshire	Hospital	Old Greenwood / Grey Crossing	Pioneer Trail	Prosser Lakeview Estates	Sierra Meadows	Tahoe Donner	Total		
Donner Lake	0	1	0	0	0	0	--	0	0	1	1	1
Downtown	--	1,848	342	154	2	257	--	55	1,543	4,201	6,050	4,202
Glenshire	--	--	13	17	0	16	--	18	28	92	447	434
Hospital	--	--	--	0	0	8	--	0	73	81	252	252
Old Greenwood / Greys Crossing	--	--	--	--	0	0	--	0	0	0	2	2
Pioneer Trail	--	--	--	--	--	1	--	1	11	13	295	294
Prosser Lakeview Estates	--	--	--	--	--	--	--	--	--	0	0	0
Sierra Meadows	--	--	--	--	--	--	--	0	7	7	81	81
Tahoe Donner	--	--	--	--	--	--	--	--	1,767	1,767	5,196	3,429
<b>TOTAL</b>	0	1,849	355	171	2	282	0	74	3,429	6,162	12,324	

Percent of Total Trips in Both Directions												
Zone	Zone										Total Trip-Ends	Total Trips With 1 or Both Ends in Zone
	Donner Lake	Downtown	Glenshire	Hospital	Old Greenwood / Grey Crossing	Pioneer Trail	Prosser Lakeview Estates	Sierra Meadows	Tahoe Donner	Total		
Donner Lake	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	--	0.0%	0.0%	0%	0%	
Downtown	--	30.0%	5.6%	2.5%	0.0%	4.2%	--	0.9%	25.0%	49%	68%	
Glenshire	--	--	0.2%	0.3%	0.0%	0.3%	--	0.3%	0.5%	4%	7%	
Hospital	--	--	--	0.0%	0.0%	0.1%	--	0.0%	1.2%	2%	4%	
Old Greenwood / Greys Crossing	--	--	--	--	0.0%	0.0%	--	0.0%	0.0%	0%	0%	
Pioneer Trail	--	--	--	--	--	0.0%	--	0.0%	0.2%	2%	5%	
Prosser Lakeview Estates	--	--	--	--	--	--	--	--	--	0%	0%	
Sierra Meadows	--	--	--	--	--	--	--	0.0%	0.1%	1%	1%	
Tahoe Donner	--	--	--	--	--	--	--	--	28.7%	42%	56%	

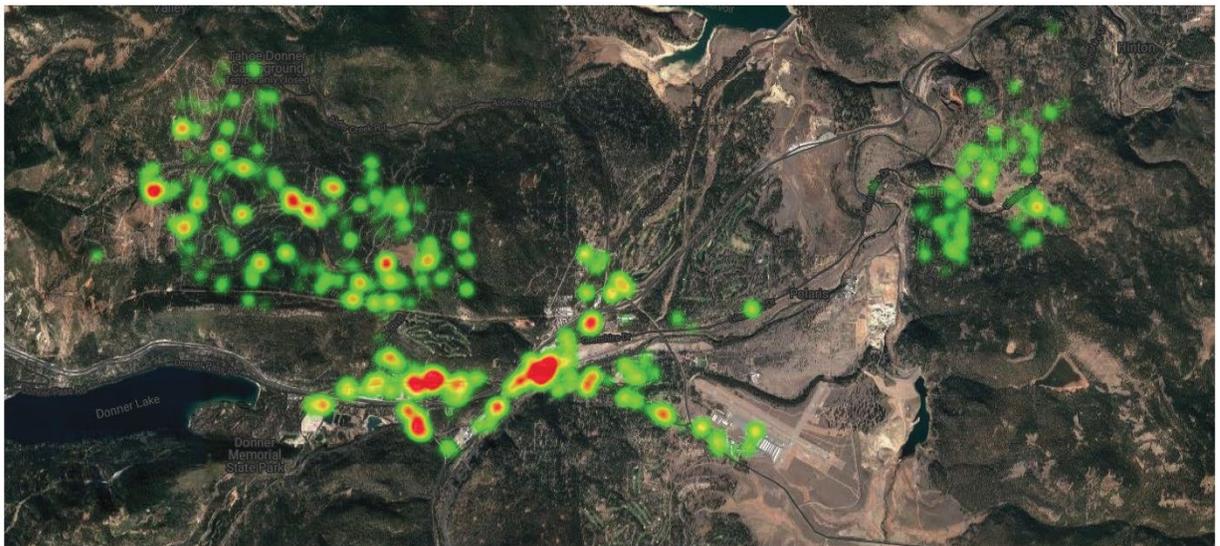
Note 1: In January 2023, Prosser Lakeview Estates, Donner Lake, and Old Greenwood/Grey Crossing were not zones served by Truckee TART Connect.

**Figure 10:**  
**Heat Maps of Truckee TART Connect Pick-Up and Drop-Off Activity**  
*January 2023*

*Pick-Ups*



*Drop-Offs*



**Table 3: Truckee TART Connect Trip Origin/Destination Data - July 2023**

One-Way Passenger-Trips											
Trip Origin Zone	Trip Destination Zone										Total
	Donner Lake	Downtown	Glenshire	Hospital	Old Greenwood / Grey Crossing	Pioneer Trail	Prosser Lakeview Estates	Sierra Meadows	Tahoe Donner		
Donner Lake	82	346	21	9	2	40	15	32	55	602	
Downtown	392	3,240	400	114	49	506	70	393	754	5,918	
Glenshire	48	459	49	10	10	43	4	25	71	719	
Hospital	8	121	6	5	15	14	0	19	19	207	
Old Greenwood / Greys Crossing	3	71	12	7	3	2	0	1	18	117	
Pioneer Trail	56	577	34	6	2	33	15	31	41	795	
Prosser Lakeview Estates	20	99	10	1	1	19	2	4	19	175	
Sierra Meadows	50	434	26	22	1	32	3	22	29	619	
Tahoe Donner	71	837	69	23	11	36	16	21	614	1,698	
<b>TOTAL</b>	<b>730</b>	<b>6,184</b>	<b>627</b>	<b>197</b>	<b>94</b>	<b>725</b>	<b>125</b>	<b>548</b>	<b>1,620</b>	<b>10,850</b>	

Total in Both Directions													
Zone	Zone										Total Trip Ends	Total Trips With 1 or Both Ends in Zone	
	Donner Lake	Downtown	Glenshire	Hospital	Old Greenwood / Grey Crossing	Pioneer Trail	Prosser Lakeview Estates	Sierra Meadows	Tahoe Donner	Total			
Donner Lake	82	738	69	17	5	96	35	82	126	1,250	1,332	1,250	
Downtown	--	3,240	859	235	120	1,083	169	827	1,591	8,124	12,102	8,862	
Glenshire	--	--	49	16	22	77	14	51	140	369	1,346	1,297	
Hospital	--	--	--	5	22	20	1	41	42	131	404	399	
Old Greenwood / Greys Crossing	--	--	--	--	3	4	1	2	29	39	211	208	
Pioneer Trail	--	--	--	--	--	33	34	63	77	207	1,520	1,487	
Prosser Lakeview Estates	--	--	--	--	--	--	2	7	35	44	300	298	
Sierra Meadows	--	--	--	--	--	--	--	22	50	72	1,167	1,145	
Tahoe Donner	--	--	--	--	--	--	--	--	614	614	3,318	2,704	
<b>TOTAL</b>	<b>82</b>	<b>3,978</b>	<b>977</b>	<b>273</b>	<b>172</b>	<b>1,313</b>	<b>256</b>	<b>1,095</b>	<b>2,704</b>	<b>10,850</b>	<b>21,700</b>		

Percent of Total Trips in Both Directions													
Zone	Zone										Total Trip Ends	Total Trips With 1 or Both Ends in Zone	
	Donner Lake	Downtown	Glenshire	Hospital	Old Greenwood / Grey Crossing	Pioneer Trail	Prosser Lakeview Estates	Sierra Meadows	Tahoe Donner	Total			
Donner Lake	0.8%	6.8%	0.6%	0.2%	0.0%	0.9%	0.3%	0.8%	1.2%	6%	12%		
Downtown	--	29.9%	7.9%	2.2%	1.1%	10.0%	1.6%	7.6%	14.7%	56%	82%		
Glenshire	--	--	0.5%	0.1%	0.2%	0.7%	0.1%	0.5%	1.3%	6%	12%		
Hospital	--	--	--	0.0%	0.2%	0.2%	0.0%	0.4%	0.4%	2%	4%		
Old Greenwood / Greys Crossing	--	--	--	--	0.0%	0.0%	0.0%	0.0%	0.3%	1%	2%		
Pioneer Trail	--	--	--	--	--	0.3%	0.3%	0.6%	0.7%	7%	14%		
Prosser Lakeview Estates	--	--	--	--	--	--	0.0%	0.1%	0.3%	1%	3%		
Sierra Meadows	--	--	--	--	--	--	--	0.2%	0.5%	5%	11%		
Tahoe Donner	--	--	--	--	--	--	--	--	5.7%	15%	25%		

- Considering the proportion of total trip-ends in each zone, the Downtown zone generated the majority of trip activity (56 percent) followed by Tahoe Donner zone (15 percent), and the Pioneer Trail zone (7 percent). Both the Old Greenwood/Greys Crossing and the Prosser Lakeview Estates zones generated only 1 percent of all trip ends.
- Considering the proportion of all trips with one or both ends in each zone, 82 percent of all trips started, ended, or were completed entirely within the Downtown zone, followed by 25 percent for the Tahoe Donner Zone, 14 percent for the Pioneer Trail zone, 12 percent for the Donner Lake zone and 11 percent for the Sierra Meadows zone. Again, the Old Greenwood/Greys Crossing and the Prosser Lakeview Estates zones generated low levels of trips (2 to 3 percent).
- The heat map of summer trip-ends (Figure 11) reflects the concentration of trip-making activity in the historic Downtown area, the commercial centers along Donner Pass Road and at Crossroads Center, and multifamily housing areas. The heat map also indicates considerable boarding and alighting activity in the airport area and along Donner Lake. Activity in Tahoe Donner was concentrated at the Trout Creek Recreation Center.

### **PASSENGER DEMAND AND DRIVERS IN SERVICE**

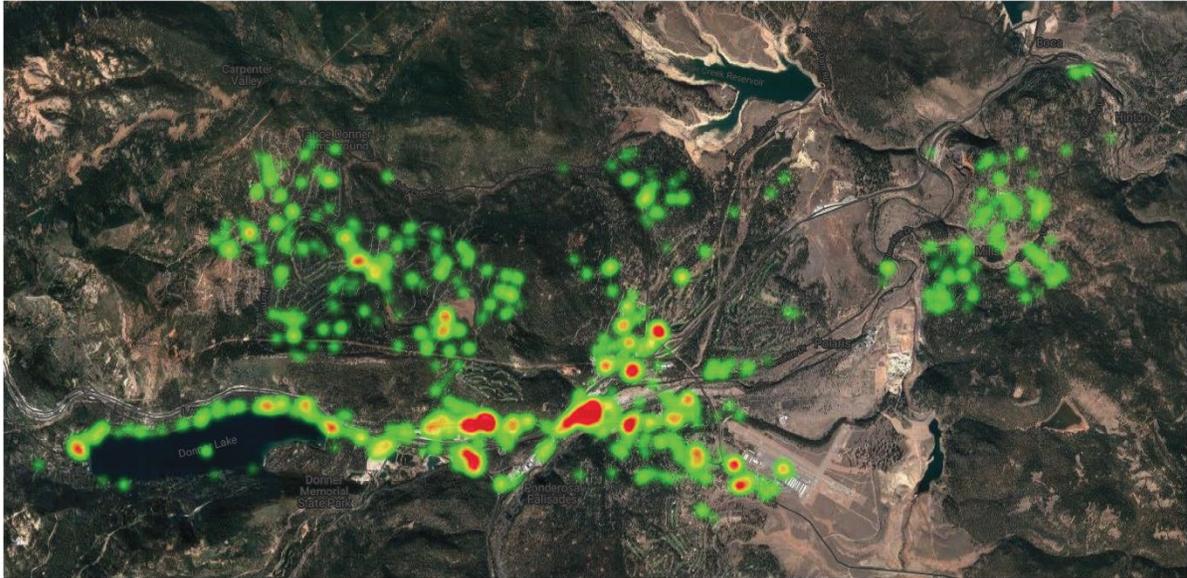
The Truckee TART Connect fleet consists of nine vans, however the number of vans operated varies by hour and day depending on demand and individual driver shifts. One factor impacting the cost and efficiency of the service is the match between demand and the number of drivers in service. Table 4 shows ridership compared to the number of drivers working per hour on three peak days during late summer 2023. On all three peak days considered, hourly ridership was greatest from 3:00 PM to 6:00 PM. While ridership clearly peaked during the afternoon, the number of drivers working was generally consistent from approximately 8:00 AM to 8:00 PM. This pattern can be better seen in Figure 12, which plots the hourly ridership (on the left axis) against the number of drivers (right axis). These patterns suggest that, on peak days during the summer 2023 season, there may have been too many drivers working in the morning and early afternoon than warranted by demand.

On the normal, off-peak days in summer 2023, shown in Table 5 and Figure 13, the number of passenger-trips carried and the number of drivers working per hour were more consistent over the day (with the exception of a 3 hour period on August 20 with 9 drivers). Generally, there was less ridership and drivers working in the early morning, then as the day progressed the number of passenger-trips and drivers working gradually increased. Both ridership and the number of drivers working tended to remain high between 8:00 AM and 8:00 PM.

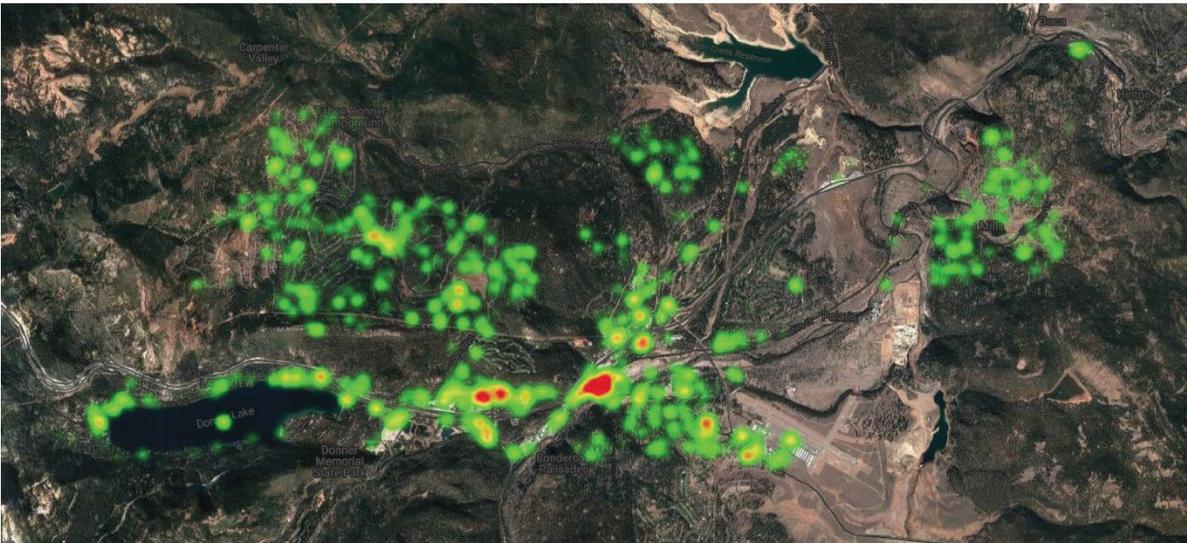
It is difficult to anticipate driver needs, as demand by hour varies day by day. In addition, there are other factors beyond demand that affect driver scheduling, such as the need to create schedules that are attractive to recruiting and retaining drivers while still providing the capacity needed at peak times. Despite these difficulties, Truckee TART Connect schedules drivers reasonably well compared to demand. The data presented does suggest, however, that fewer drivers could be assigned to work early in the day (prior to 2:00 PM) and later in the evening (from 8:00 PM and 12:00 AM).

**Figure 11:**  
**Heat Maps of Truckee TART Connect Pick-Up and Drop-Off Activity**  
*July 2023*

*Pick-Ups*



*Drop-Offs*

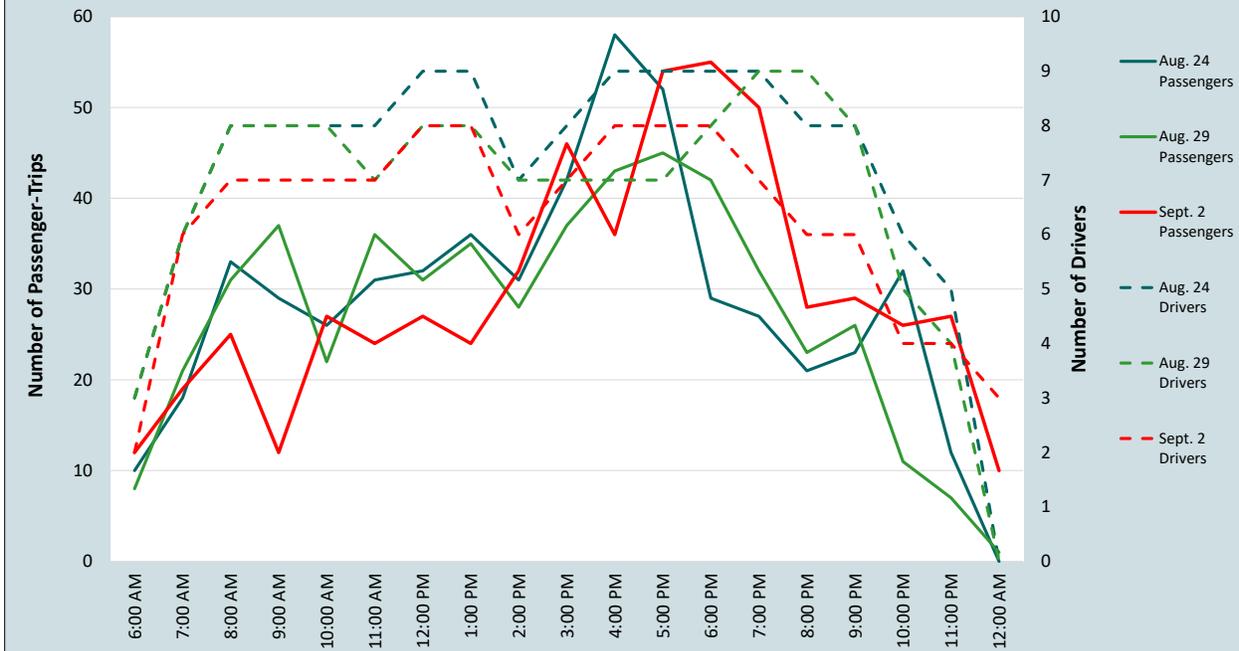


**Table 4: Truckee TART Connect Ridership and Vehicle Usage by Hour**  
 Summer 2023 - Peak Days

Time of Day	Thursday August 24		Tuesday August 29		Saturday September 2 <sup>1</sup>	
	Psgrs	Avg Drivers	Psgrs	Avg Drivers	Psgrs	Avg Drivers
6:00 AM	10	3	8	3	12	2
7:00 AM	18	6	21	6	19	6
8:00 AM	33	8	31	8	25	7
9:00 AM	29	8	37	8	12	7
10:00 AM	26	8	22	8	27	7
11:00 AM	31	8	36	7	24	7
12:00 PM	32	9	31	8	27	8
1:00 PM	36	9	35	8	24	8
2:00 PM	31	7	28	7	32	6
3:00 PM	42	8	37	7	46	7
4:00 PM	58	9	43	7	36	8
5:00 PM	52	9	45	7	54	8
6:00 PM	29	9	42	8	55	8
7:00 PM	27	9	32	9	50	7
8:00 PM	21	8	23	9	28	6
9:00 PM	23	8	26	8	29	6
10:00 PM	32	6	11	5	26	4
11:00 PM	12	5	7	4	27	4
12:00 AM	0	0	1	0	10	3

Note 1: Typically, Truckee TART Connect ridership drops on Saturdays. Saturday September 2nd fell on Labor Day Weekend, and thus saw above average ridership.

**Figure 12: Truckee TART Connect Ridership and Vehicle Usage by Hour**  
 Summer 2023 - Peak Days



**Table 5: Truckee TART Connect Ridership and Vehicle Usage by Hour**

Summer 2023 - Normal Days

Time of Day	Sunday August 20		Wednesday August 23		Wednesday August 30	
	Psgrs	Avg Drivers	Psgrs	Avg Drivers	Psgrs	Avg Drivers
6:00 AM	9	3	4	1	10	3
7:00 AM	18	6	18	3	20	5
8:00 AM	19	7	23	6	31	7
9:00 AM	24	7	25	7	32	7
10:00 AM	24	6	33	7	27	6
11:00 AM	25	6	34	7	23	6
12:00 PM	16	7	29	7	24	7
1:00 PM	19	7	16	5	22	6
2:00 PM	31	6	24	6	17	4
3:00 PM	29	9	28	6	25	5
4:00 PM	24	9	33	6	29	6
5:00 PM	31	9	29	6	38	6
6:00 PM	16	8	33	6	36	6
7:00 PM	28	7	44	7	27	6
8:00 PM	26	6	27	7	27	6
9:00 PM	23	5	34	7	26	6
10:00 PM	11	3	22	5	17	5
11:00 PM	19	2	10	3	5	5
12:00 AM	4	1	1	1	4	1

**Figure 13: Truckee TART Connect Ridership and Vehicle Usage by Hour**  
Summer 2023 - Normal Days



## PASSENGER TRIP LENGTH

Passenger trip length data, as provided by Downtowner, was evaluated for January and July 2023. As shown in Table 6, the average trip length was 3.0 miles in January and 3.8 miles in July, while the median trip length (the value at which half of trips are longer and half shorter) was 2.4 in January and 3.1 in July. The majority of Truckee TART Connect trips were between 1 and 4 miles in length (67 percent of January trips and 56 percent of July trips). There was a substantially greater proportion of trips longer than 5 miles in July (27 percent) than in January (15 percent). In both months, the proportion of trips less than a half-mile was low, totaling 1.7 percent in January and 1.0 percent in July.

Passenger Trip Mileage		% of Total Trips	
Between	And	Jan-23	Jul-23
0.00	0.25	0.8%	0.4%
0.25	0.50	0.9%	0.6%
0.50	1.00	8.8%	5.7%
1.00	2.00	27.9%	19.3%
2.00	3.00	23.4%	21.7%
3.00	4.00	15.3%	15.1%
4.00	5.00	7.5%	10.6%
5.00	10.00	14.5%	24.0%
10.00	15.00	0.9%	2.3%
15.00	20.00	0.0%	0.3%
<b>Average Trip Mileage</b>		3.0	3.8
<b>Median Trip Mileage</b>		2.4	3.1

*Source: Downtowner.*

## PERFORMANCE ANALYSIS

Truckee TART Connect operations and performance are analyzed in Table 7 from the summer of 2022 through winter 2023-24. Important findings from the performance analysis are as follows:

- Passenger-Trips per Hour:** A good measure of the productivity of a transit service is the number of passenger-trips carried per vehicle service hour. Overall, the Truckee TART Connect service has carried 5.3 passenger-trips per vehicle service hour since the program was initiated in June 2022. The most productive season, thus far, was winter 2022-23, when the microtransit program carried 6.5 passenger-trips per vehicle service hour. This high productivity rate was likely because of the shorter service span during the winter 2022-23 season and a greater rate of shared trips. The least productive season was the initial summer pilot (3.8 per vehicle service hour). The Truckee TART Connect has been significantly more productive than the Truckee DAR (2.7 passenger-trips per vehicle service hour in Fiscal Year (FY) 2022-23) and less productive than the Truckee Local Route (7.0 passenger-trips per vehicle service hour in FY 2022-23). The Truckee TART Connect has thus far been somewhat less productive than the nearby Placer TART Connect microtransit service, which carried 7.8 passenger trips per service hour during the first eleven months of 2023.

**Table 7: Truckee TART Connect Performance***Summer 2022 - Winter 2023-24*

Performance Data and Indicators	Season						Total
	Summer 2022	Winter 2022-23	Spring 2023	Summer 2023	Fall 2023	Winter 2023-24 <sup>1</sup>	
Passengers	19,556	33,127	28,221	30,826	36,702	36,547	184,979
Vehicle Service Hours	5,115	5,134	5,423	5,728	7,325	6,111	34,836
Vehicle Service Miles	62,831	81,594	103,460	105,859	136,186	111,745	601,675
Total Operating Cost	\$434,387	\$529,107	\$380,971	\$398,496	\$513,361	\$387,240	\$2,643,562
Average Wait Time (Minutes)	9	35	22	22	22	31	23
<i>Passenger-Trips per Hour</i>	3.8	6.5	5.2	5.4	5.0	6.0	5.3
<i>Passenger-Trips per Mile</i>	0.31	0.41	0.27	0.29	0.27	0.33	0.31
<i>Operating Cost per Passenger-Trip</i>	\$22.21	\$15.97	\$13.50	\$12.93	\$13.99	\$10.60	\$14.29

*Source: Truckee TART Connect Monthly Performance Reports*

Note 1: December and January only.

- *Passenger-Trips per Mile*: The number of passenger-trips carried per vehicle service mile is another metric used to assess transit productivity. The number of passenger-trips carried per vehicle service mile on the Truckee TART Connect has stayed rather consistent from season to season, averaging 0.31, but reached a peak of 0.41 in the winter 2022-23 season. Comparing the Truckee TART Connect to FY 2022-23 performance for the Truckee DAR and the Truckee Local Route, the Truckee TART Connect carried more passenger-trips per vehicle service mile than the Truckee DAR (0.2) and less than the Truckee Local Route (0.4).
- *Cost per Passenger-Trip*: Cost per passenger-trip is a good measure to assess cost efficiency. Across the whole service history, the Truckee TART Connect cost per passenger-trip has been \$14.29. Note that this figure only considers operating/vehicle costs and does not include any administrative or marketing costs incurred directly by Town staff. By season, the cost per passenger-trip was greater during the initial pilot period, when ridership was still growing, and was lowest during the winter 2023-24 season (\$10.60) when there was exceptionally high ridership. The Truckee TART Connect has thus far been more cost efficient than the Truckee DAR or Truckee Local Route; in FY 2022-23, the Truckee DAR incurred a cost of \$75.88 per passenger-trip and the Truckee Local Route incurred a cost of \$30.50 per passenger-trip. The Truckee TART Connect has been slightly less cost-efficient than the nearby Placer TART Connect microtransit service, which incurred \$11.36 in costs per passenger-trip from January through November 2023.

## REVIEW OF SERVICE QUALITY

There are various measures to assess the quality of microtransit service, as shown in Table 8. The service quality review shown focuses on Truckee TART Connect operations from January 1, 2023, to January 31, 2024, once the longer span of service had been implemented. Findings from this review include:

- Percent of Rides Shared: Having a high proportion of rides shared between more than one travel group is beneficial in reducing the total VMT associated with the microtransit service. By season, this rate was highest in winters 2022-23 and 2023-24 (55 and 58 percent, respectively), slightly lower in the summer and fall of 2023 (both 53 percent), and lowest in spring 2023 (48 percent). The lower proportion of shared trips in summer 2023 compared to the two winter seasons is likely due to the trips being more dispersed, as discussed previously in the analysis of origin/destination and trip length data. The lower spring 2023 figure reflects the overall lower ridership observed, which reduced the number of opportunities for shared trips.
- Average Wait Time: The average amount of time passengers waited after booking their trip was 26 minutes, ranging from a low of 22 minutes in summer 2023 to a high of 37 minutes in winter 2022-23. The average wait time during the winter 2022-23 season was impacted by the exceptionally severe weather and road conditions, as well as by there being fewer vehicles in service.
- Average Ride Time: The average time passengers spent traveling on the Truckee TART Connect vehicles stayed consistent at 11 minutes from season to season, ranging between 10 and 12 minutes depending on the month.
- Average Experience Rating: On a scale of 1 to 5, passengers consistently gave the Truckee TART Connect an impressive average rating of 4.9.
- Percent of Pickups More than 5 Minutes Late: This value ranged between 11 and 16 percent depending on the month, with the exception of March 2023 when winter conditions contributed to 22 percent of pickups being made more than 5 minutes late.
- Percent of Pickups with More than a 30 Minute Wait: The proportion of trips requiring a wait of 30 minutes or more was highest in the winter 2022-23 and 2023-24 seasons (50 percent and 40 percent, respectively). Figure 14 shows the proportion of trips with 30-or-more minute waits by month.
- Missed Trips: During the time period considered, *no* trips were missed by the contractor, which is a remarkable achievement.
- Rider No Shows: On any demand responsive transit service, the proportion of riders that are “no shows” (they are not present to board when the vehicle arrives) is a concern, as these trips represent a waste of resources. Overall, 7 percent of Truckee TART Connect ride requests were no shows from January 2023 to January 2024. This proportion stayed relatively consistent season to season, however the highest frequency of no-shows was observed during the winter 2023-24 season (8 percent).
- Use of the App: Additionally, Downtowner reported that from August to October 2023, 97 percent of rides were requested through the app versus 3 percent that were requested by phone. This data reflects very frequent use of the app compared to other microtransit programs in the region, indicating passengers have a high level of comfort with the app-based platform.

**Table 8: Truckee TART Connect Service Quality (1/2)**

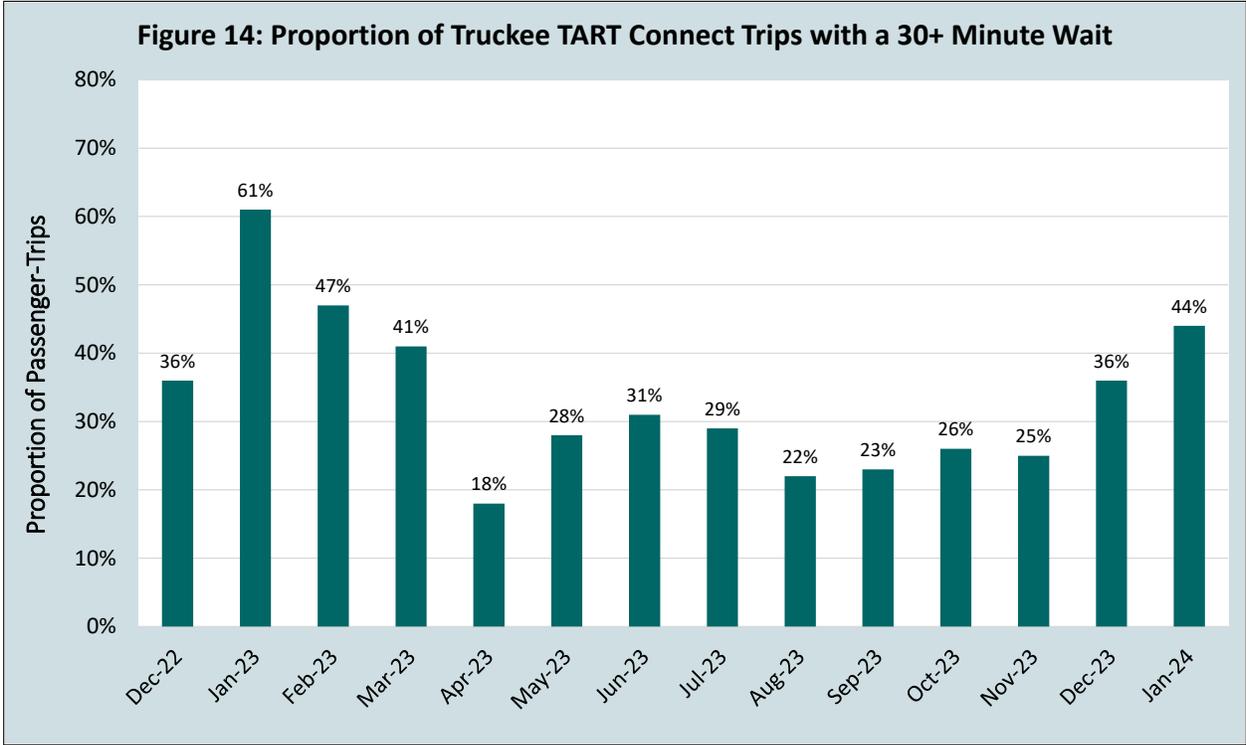
Service Quality Measure	2023												2024
	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sept	Oct	Nov	Dec	Jan.
Percent of Rides Shared	58%	57%	51%	44%	48%	50%	54%	53%	54%	53%	53%	56%	60%
Average Wait Time	42	36	32	19	23	25	24	20	21	23	22	28	33
Average Ride Time	12	11	11	10	11	12	12	11	11	11	10	11	11
Average Experience Rating (Out of 5)	4.9	4.9	4.9	4.9	4.9	4.9	4.9	4.9	4.9	4.9	4.9	4.9	4.9
% of Pickups More Than 5 Minutes Late	13%	14%	22%	11%	11%	14%	14%	12%	13%	12%	13%	12%	16%
% of Pickups With 30+ Minute Wait	61%	47%	41%	18%	28%	31%	29%	22%	23%	24%	25%	36%	44%
Missed Trips	0	0	0	0	0	0	0	0	0	0	0	0	0
Rider No Shows	413	457	340	396	398	559	681	577	525	679	557	904	1,166
Percent Rider No Shows	7%	8%	6%	6%	6%	6%	6%	5%	5%	7%	6%	7%	9%

Source: Truckee TART Connect Monthly Performance Reports

**Table 8: Truckee TART Connect Service Quality (2/2)**

Service Quality Measure	Average by Season					Total
	2023				2024	
	Winter (Jan-Mar)	Spring (Apr-Jun)	Summer (Jul-Aug)	Fall (Sept-Nov)	Winter (Dec - Jan)	
Percent of Rides Shared	55%	48%	53%	53%	58%	54%
Average Wait Time	37	23	22	22	31	26
Average Ride Time	11	11	11	11	11	11
Average Experience Rating (Out of 5)	4.9	4.9	4.9	4.9	4.9	4.9
% of Pickups More Than 5 Minutes Late	16%	12%	13%	13%	14%	14%
% of Pickups With 30+ Minute Wait	50%	27%	25%	24%	40%	32%
Missed Trips	0	0	0	0	0%	0%
Rider No Shows	403	467	628	585	1,042	642
Percent Rider No Shows	7%	6%	6%	6%	8%	7%

Source: Truckee TART Connect Monthly Performance Reports



## PASSENGER CHARACTERISTICS AND PERCEPTIONS

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### INTRODUCTION

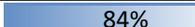
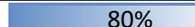
This chapter presents the results of two passenger survey efforts conducted by Downtowner, Inc. The first effort considered is the “in-app” survey, which was sent to all riders booking through the app on the day of their trip. The second effort considered is the email survey, which was sent by Downtowner to all riders within roughly a week of their trip.

### PASSENGER IN-APP SURVEY RESULTS

In-app surveys completed by Truckee TART Connect passengers during summer 2022 (815 responses), winter 2022-23 (480 responses), and summer 2023 (364 responses) were evaluated. The in-app survey results are presented by season in Table 9, with a detailed analysis included in Appendix A.

- The most common Truckee TART Connect **trip purposes** were social/recreation and/or dining (56 percent of summer 2022 respondents, 28 percent of winter 2022-23 respondents, and 33 percent of summer 2023 respondents). The proportion of respondents who reported they were commuting to/from work increased progressively over the three survey efforts from 14 percent in the summer of 2022 to 25 percent the following summer. This shift likely was due to service beginning earlier, more vehicles being in service, and the expanded service area, all of which helped residents be able to commute to jobs with traditional daytime work shifts.
- **Travel mode shift** refers to how passengers would have otherwise traveled if the transit service were unavailable, which is a key factor to consider when analyzing the overall impact of the program on mobility. The proportion of surveyed passengers who reported that they would have otherwise driven themselves ranged from 20 percent during the summer 2023 survey to 28 percent during the summer 2022 survey. Other common modes the passengers would have used instead of microtransit included driving with others, walking, or using an Uber/Lyft/taxi. Between 14 to 21 percent of the passengers would not have made their trip without Truckee TART Connect, indicating that the service is expanding overall community mobility. Of note, the proportion that would have walked to complete their trip was higher in the winter (21 percent) than in the summers (15 and 16 percent), even though walking conditions were more difficult.
- During all three in-app survey efforts, most passengers reported that they used Truckee TART Connect to complete their entire trip (80 to 84 percent). The remainder reported that they used **other modes to complete their trip** in addition to Truckee TART Connect, such as walking, bicycling, and getting a ride with others. A small proportion connected with a TART fixed route to complete their trip (2 percent in the summer 2022 survey, 6 percent in the winter 2022-23 survey, and 3 percent in the summer 2023 survey). The higher proportion of people transferring to TART fixed routes in winter likely reflects persons travelling to ski resorts. Overall, however, the use of TART Connect as a “first mile/last mile” connection for longer regional transit trips has thus far been quite low.

- The majority of both the winter 2022-23 and summer 2023 in-app survey respondents were **Truckee residents** (70 percent and 76 percent, respectively). The remaining respondents either lived outside Truckee or were traveling with a group member who lived outside Truckee.

<b>Table 9: Truckee TART Connect In-App Survey Results</b>						
	Summer 2022	Winter 2022-23	Summer 2023		Summer 2022	Winter 2022-23
<b># Respondents</b>	815	480	364			
<b>Trip Purpose</b>						
Social Activity/Event	 27%	 12%	 18%			
Restaurant/Bar	 22%	 16%	 15%			
Outdoor Recreation	 17%	 16%	 14%			
Shopping	 14%	 14%	 10%			
Work	 14%	 21%	 25%			
Medical/Dental	 5%	 5%	 5%			
School	 2%	 7%	 3%			
Other	 15%	 17%	 18%			
<b>Mode Shift - How Respondent Would Have Made Trip Without Truckee TART Connect</b>						
Drive Alone	 28%	 21%	 20%			
Would Not Take Trip	 17%	 21%	 14%			
Drive With Others	 17%	 13%	 16%			
Walk	 15%	 21%	 16%			
Taxi/Uber/Lyft	 10%	 13%	 9%			
Bicycle/Scooter/E-Bike	 6%	 2%	 4%			
TART Bus	 5%	 6%	 10%			
Other	 4%	 5%	 6%			
<b>Other Travel Modes Used to Complete Trip</b>						
None	 84%	 80%	 81%			
Walking	 8%	 6%	 3%			
Getting a Ride	 4%	 6%	 3%			
TART Fixed Routes	 2%	 6%	 3%			
Bicycling	 1%	 0%	 1%			
Driving Alone	 1%	 2%	 1%			
<b>Residency Status</b>						
Passenger and Group Members Live in Truckee	--	 70%	 76%			
Passenger or Group Member Live Outside of Truckee	--	 30%	 24%			

## PASSENGER EMAIL SURVEY RESULTS

Downtown sends survey invitations via email within one week of the passenger's actual trip. The full email survey results are included in Appendix B. Highlights of only the winter 2022-23 (321 responses) and summer 2023 (231 responses) surveys are discussed below and presented in Table 10.

- Regarding **resident/visitor status**, the majority of the email survey participants were full-time Truckee residents (56 percent in the winter and 61 percent in the summer). 18 percent of the respondents to both surveys were second homeowners. More riders were seasonal renters in winter (12 percent) than in summer (5 percent). The proportion of respondents who were visitors (day or overnight) was higher in the summer versus the winter.
- The majority of survey participants had **home zip codes** in the Truckee area (65 percent of the respondents to both the winter and summer surveys). Residents of the Bay Area comprised a substantial proportion of respondents also (25 percent in winter and 19 percent in summer). No other area was home to more than 5 percent of respondents in either survey.
- In regard to **age**, 21 percent of the winter respondents were 35 to 44, 20 percent were 45 to 54, and 19 percent were 25 to 34. Of the summer respondents, 21 percent were 35 to 44, 21 percent were 45 to 54, and 18 percent were 55 to 64. Teenagers (13 to 18) were 8 percent of riders in winter and 6 percent in summer. Compared to the actual Town demographics, as reported in the American Community Survey (ACS) 2022 5-Year Estimates, working-age adults are overly represented amongst Truckee TART Connect passengers; 16 percent of all Truckee residents are adults ages 35 to 44, 15 percent are ages 45 to 54, and 15 percent are 55 to 64.
- Respondents were asked how often they **use TART fixed route services**. In both the winter and summer, the large majority of respondents either do not or only on seldom occasion use TART fixed routes (73 percent and 79 percent, respectively). A small proportion reported they ride TART fixed route services either most or every day (13 percent of the winter respondents and 8 percent of the summer respondents).
- Both the winter and summer respondents largely **heard about the Truckee TART Connect service** from friends or colleagues (41 percent and 48 percent, respectively). The next most common source where passengers learned about the service was social media (14 percent and 11 percent, respectively). Other common information sources identified by respondents in both seasons included news articles, TahoeTruckeeTransit.com, and print advertisements.
- Respondents were asked about **desired service improvements**. In the winter survey, 24 percent of the respondents who asked for a service improvement requested later hours of service, 15 percent requested earlier service, and 55 percent asked for the service area to be expanded. In the summer survey, 30 percent of the respondents who asked for an improvement asked for later service hours, 8 percent asked for easier transfers between zones, and 37 percent asked for an expanded service area.

- On a scale of 1 to 10, 79 percent of respondents reported their likelihood of **recommending Truckee TART Connect to a friend or colleague** a “9” or a “10” out of 10. This proportion increased to an impressive 86 percent during summer 2023.

<b>Table 10: Truckee TART Connect Email Survey Results</b>		
	<b>Winter 2022-23</b>	<b>Summer 2023</b>
<b># Respondents</b>	321	231
<b>Resident/Visitor Status</b>		
Full Time Resident	56%	61%
2nd Home Owner	18%	18%
Seasonal Renter	12%	5%
Overnight Visitor	11%	13%
Day Visitor	2%	4%
<b>How Often Participants Use TART Fixed Route Service</b>		
Everyday	6%	3%
Most Days	7%	5%
2-3 Days/Week	10%	8%
1 Day/Week	4%	5%
Occasionally	26%	53%
Never	47%	26%
<b>Age</b>		
Under 13	0%	0%
13 to 18	8%	6%
19 to 24	9%	8%
25 to 34	19%	15%
35 to 44	21%	21%
45 to 54	20%	21%
55 to 64	13%	18%
65 and Above	10%	11%
<b>How Did You Hear About TART Connect?</b>		
Friend or Colleague	41%	48%
Other	17%	15%
Social Media	14%	11%
TahoeTruckeeTransit.com	9%	5%
News Articles	8%	9%
Lodging/Hotel	4%	5%
Print Advertisements	4%	4%
TART Driver	2%	1%

## GENERAL COMMUNITY PERCEPTIONS AND OPINIONS

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### GENERAL COMMUNITY SURVEY

LSC conducted an online, general community survey during November and December 2023 to learn more about how the Truckee TART Connect service is used and perceived by local residents, including riders and non-riders alike. The survey was largely advertised through social media. Respondents were offered a chance to win one of ten \$100 gift cards through a random drawing to incentivize participation. Overall, there were a 593 responses to the community survey. This section discusses the survey effort, with some summary results presented in Table 10. More detailed results are presented in Appendix C.

### Residency Data

- In regard to **residency/visitor status**, the large majority of the general community survey participants were permanent Truckee residents (70 percent), which has been a consistent trend during most public participation efforts regarding the Truckee TART Connect. Others reported that they are employed in Truckee, but do not live in the community (9 percent) or that they are second homeowners (11 percent). Only 10 percent of the survey respondents were visitors.
- Many of the community survey respondents **live** in Tahoe Donner (35 percent), Glenshire (17 percent), Sierra Meadows (8 percent), or Prosser/Lakeview (6 percent), neighborhoods which collectively account for the majority of single-family dwelling units in the Town.

### Awareness of Truckee TART Connect

- Almost all of the respondents (98 percent) were **aware of the Truckee TART Connect** service.
- The most common ways that the respondents **learned about the Truckee TART Connect** were word of mouth (55 percent), seeing the vehicles around the community (31 percent), and social media posts (19 percent).

### Past Use of Truckee TART Connect

- The majority of the community survey respondents (88 percent) had **used the Truckee TART Connect at least once previously**. 24 percent of the respondents reported they use the microtransit service at least once a week, if not more frequently, indicating a mix of both regular riders and occasional riders.
- The **top reasons why the participants rode Truckee TART Connect** were to avoid driving after drinking (46 percent), to avoid parking hassles (41 percent), and to get to recreation activities or events (34 percent).
- The **top reasons why the participants had not used Truckee TART Connect** were the wait and travel times being too long (48 percent), they prefer using their own personal car (22 percent), and the service hours did not run late enough to meet their needs (21 percent).

**Table 11: Truckee TART Connect General Community Survey Results**

<b># Respondents</b>	593
<b>Resident/Visitor Status</b>	
Full Time Resident	70%
Part Time Resident / 2nd Homeowner	11%
Visitor to Truckee	10%
Employed in Truckee	9%
Seasonal Resident	8%
Other	3%
<b>Top Reasons Participants Use Truckee TART Connect</b>	
To Avoid Driving After Drinking	46%
To Avoid Parking Hassles/Costs	41%
For Recreation or Events	34%
To Help the Environment	33%
To Save on Gas/Auto Costs	27%
Traveling by Car is Not Available	26%
<b>Top Reasons Participants Do Not Use Truckee TART Connect</b>	
Takes too Long	48%
My Car is More Convenient	22%
It Does Not Run Late Enough	21%
It Doesn't Go Where I Need to Go	14%
I Make Multiple Stops as a Part of My Trip	13%
It Does Not Pick Up at My Location	7%
It Does Not Start Early Enough	7%
I'd Rather Bike or Walk	6%
<b>How Did You Hear About TART Connect?</b>	
Word of Mouth	55%
Social Media	19%
Saw the Vehicles	31%
Read an Article	14%
Saw a Newspaper Ad	6%
Homeowner Newsletter	5%
Website	7%
Radio/TV	4%
Other	7%

## Support for the Truckee TART Connect Service

- Almost all of the general community survey respondents indicated support for **year-round microtransit service**, with slightly greater support for providing Truckee TART Connect service in the summer and winter compared to the fall and spring.
- 68 percent of the respondents reported the **likelihood they would recommend** the Truckee TART Connect to friends or family a 10 out of 10. A full 91 percent responded with a 7 or above compared. In comparison, only 77 percent of respondents in the summer 2022 survey, presented in the *Truckee Microtransit Study (2023)*, reported their likelihood of recommending the service a 7 or higher, indicating an increase in overall support for the Truckee TART Connect program.

## Other Comments on Truckee TART Connect

Respondents were given the opportunity to provide an open-ended comment or suggestion. In all, 319 people provided an open-ended response. About half of the comments were positive compliments for the program (47 percent). Regarding potential service improvements, the most common request was for wait times to be shortened (12 percent), with many suggesting that Truckee TART Connect hire additional drivers or allow for pre-scheduled rides. 9 percent requested for the service area to be expanded; 8 people requested for services to be expanded to the areas just south of Truckee in Martis Valley (including the Placer County portion of Sierra Meadows), 7 people requested service to Northstar, 8 to Donner Summit/Sugar Bowl, and 3 to Olympic Valley. Only 6 percent of respondents asked for extended service hours, but most of these requests were for later service.

Although 9 percent of respondents left negative comments regarding service quality or driver decorum, these comments are still constructive and can be used to direct future improvements. Additionally, 3 percent stated they were unable to use Truckee TART Connect because the service is unreliable.

## BCycle

At the request of the Town, several questions were included regarding the BCycle electric bike share program launched in summer 2023. The results to these questions indicated that most respondents (67 percent) were aware of the program, but only a few had actually used it (9 percent). Of those aware of the program but not using it, most indicated they just had not had the opportunity (31 percent) or that they had their own bike (16 percent). However, a substantial proportion (21 percent) did not know enough about how to use it, which indicates an opportunity for increased participation through expanded marketing by the operator BCycle.

## Respondent Demographics

Several questions were asked regarding the demographics of the respondents. These results are presented below, and compared to the actual demographics of the Town per the American Community Survey (ACS) 2022 5-Year Estimates:

- 63 percent were female versus 36 percent male, excluding those who declined to state. This means the survey respondents were disproportionately female compared to the Town's actual residents (49 percent of Truckee residents are female per the ACS).

- Most (61 percent) were aged 35 to 64, followed by 23 percent aged 18 to 34 and 12 percent aged 65 or above. The respondents were generally more middle-aged compared to actual Truckee residents, as the ACS has estimated that 22 percent of Truckee residents are youth younger than 18 and 17 percent are adults older than 65.
- 8 percent of respondents live in households without a car, 28 percent have 1 car, and 64 percent have two or more cars. The ACS estimates that only 2 percent of Truckee households have no vehicle and that 22 percent have only 1 car.
- Adjusting for respondents that declined to state, 80 percent were White/Caucasian followed by 12 percent Latino/a/x/Hispanic. This is similar to the Town's actual demographics, as 81 percent of residents are White/Caucasian followed by 15 percent of residents who are Latino/a/x/Hispanic (ACS 2022 5-Year Estimates).
- Adjusting for those that declined to state, 55 percent of respondent households had an estimated annual income exceeding \$100,000, 23 percent had income between \$50,000 and \$100,000, 14 percent had income between \$20,000 and \$50,000, and 7 percent had income below \$20,000. This income distribution is similar to what is observed across Truckee as a whole: 54 percent of Truckee residents earn an annual income exceeding \$100,000, 25 percent earn between \$50,000 and \$100,000, and 21 percent earn less than \$50,000. The community survey respondents represented overall higher incomes compared to the Truckee Local fixed route passengers surveyed during the most recent 2022 onboard survey effort, of whom over 80 percent reported earning less than \$50,000 per year.<sup>3</sup>

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<sup>3</sup> Warner Transportation Consulting, Inc. (2022). *Results of the TART and TTD 2022 Transit Passenger Surveys*. <https://www.townoftruckee.com/home/showpublisheddocument/22010/638186375484239067>

## IMPACTS OF THE TRUCKEE TART CONNECT SERVICE

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### INTRODUCTION

This chapter discusses how the Truckee TART Connect has impacted Vehicle Miles Traveled (VMT) and parking demand in the Town of Truckee, as well as how the microtransit program has benefitted mobility access and the local economy.

### ANALYSIS OF IMPACT ON REGIONAL VEHICLE MILES TRAVELED

The Town of Truckee has adopted several goals related to reducing the Town's environmental impacts, one of which is to reduce greenhouse gas emissions by 80 percent compared to the Town's 2008 baseline by 2040.<sup>4</sup> As a part of this broader goal, the Town intends to reduce VMT and associated greenhouse gas emissions that are generated by travel within the community. Given this policy context, it is worthwhile to evaluate how the Truckee TART Connect service has impacted VMT in Truckee by considering both the personal vehicle trips removed from roadways and the VMT generated by the service itself.

It should be noted that the transition to zero-emission vehicles (ZEVs) will decrease the relative emissions generated per VMT by the Truckee TART Connect. Operating the microtransit service with ZEVs will reduce emissions associated with VMT by about 78 percent, even if the ZEVs are powered with electricity sourced from nonrenewable sources.<sup>5</sup> Assuming the Town achieves its goal of 100 percent renewable electricity by 2030, the emissions generated per VMT by the Truckee TART Connect will decrease even further. Currently, the Town is pursuing purchase of its first ZEVs for microtransit; the Town anticipates ordering six, nine-passenger ZEVs to be delivered later in 2024 for the microtransit program.

### Winter Season

The operations data presented in Chapter 3, as well as the survey responses shown in Chapter 4, were used to analyze the net impact of the Truckee TART Connect service on VMT during the winter 2022-23 season. This analysis is shown in Table 12, and consisted of the following:

- Per Downtowner performance reports, 20,710 travel groups were served on the Truckee TART Connect service during the winter 2022-23 season.
- A total of 81,594 passenger-miles of travel were served.
- Based on the winter in-app survey conducted by Downtowner, if the Truckee TART Connect service was unavailable, 33.3 percent of respondents would have either driven themselves or gotten a ride in order to complete their trip. Multiplying the total number of groups by the average passenger-trip length, then multiplying that product by the proportion of passengers who would have instead driven/been driven yields 17,003 avoided VMT.

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<sup>4</sup> Town of Truckee. (2023). *Town of Truckee 2040 General Plan*. <https://www.truckee2040.com/documents>

<sup>5</sup> Alternative Fuels Data Center. (2022). *Emissions from Electric Vehicles*. Alternative Fuels Data Center. [https://afdc.energy.gov/vehicles/electric\\_emissions.html](https://afdc.energy.gov/vehicles/electric_emissions.html)

- 12.9 percent of riders reported that they would have taken an Uber/Lyft/taxi instead of Truckee TART Connect. This proportion was multiplied first by the total number of groups, then by the average passenger-trip length, and then doubled in order to account for the additional VMT generated for the pick-up, yielding 13,149 VMT avoided Uber/Lyft/taxi travel.
- Microtransit can also result in VMT savings by facilitating increased use of other transit services (“first/last mile connections”). The winter in-app survey conducted by Downtowner found that 5.6 percent of passengers transferred to TART fixed route buses as a part of their trip. It is assumed these individuals would not have been able to make their longer transit trip if not for Truckee TART Connect. Based on winter ridership on the fixed routes, the proportions of Truckee fixed route passengers going to/from various destinations in winter were estimated. Multiplying the proportion of microtransit passengers who transferred to TART fixed routes by the estimated average travel length to/from each destination and summed over all destinations, the VMT saved by facilitating fixed route transfers was estimated to be 7,718.

In sum, during the winter 2022-23 season the Truckee TART Connect service eliminated 37,871 VMT from regional roadways. During this time period, Truckee TART Connect vehicles also generated 93,793 VMT, meaning the overall impact of the service was a net increase of 55,922 VMT. Over the 107 days of the winter 2022-23 season, this equaled an average increase of 523 VMT per day.

**Table 12: Analysis of Truckee TART Connect VMT Impacts - Winter 2022-23**

Total Passenger-Trips	33,127		
Average Group Trip Size	1.60		
Total Group Trips Served	20,710		
Total Passenger-Miles of Travel	81,594		
Average Passenger Trip Length on Truckee TART Connect	2.46		VMT
Proportion of Passenger that would have driven/been driven	33.3%		-17,003
Proportion of Passenger that would have used TNC/Taxi	12.9%		-13,149
Total Avoided VMT on Microtransit			-30,153
Proportion of passengers transferring to fixed route	5.6%		
Fixed Route Destination of Those Transferring		%	Trip Length (Mi)
Tahoe City/West Shore		7%	14
Kings Beach//North Shore		3%	12
Northstar		30%	7
Palisades		25%	11
Truckee		35%	1.5
<b>Total</b>		100%	-7,718
Total Avoided VMT on Microtransit and Fixed Route			-37,871
		<i>Truckee TART Connect VMT</i>	93,793
		<b>Net Change in Season VMT</b>	55,922
		<b>Net Change in Avg Daily VMT</b>	523

## Summer Season

Truckee TART Connect operations data was used to conduct an analysis of VMT impacts during the summer 2023 season as well (Table 13). Key calculations/findings are as follows:

- Truckee TART Connect served 22,099 travel groups during the summer 2023 season.
- A total of 105,859 passenger-miles of travel were served.
- 25,853 VMTs were avoided by 34.1 percent of passengers taking Truckee TART Connect instead of driving themselves or getting a ride.
- 13,343 VMTs were avoided by 8.8 percent of passengers taking Truckee TART Connect instead of taking a taxi/Uber/Lyft.
- 2,473 VMTs were avoided by the Truckee TART Connect service facilitating transfers to fixed route services.

Overall, the analysis found that the Truckee TART Connect eliminated 41,669 VMT from Truckee roadways during the summer of 2023. The total number of VMT operated by the Truckee TART Connect service during this time period was 111,569, meaning the net impact of the service during the summer 2023 season was an increase of 69,900 VMT, or an average of 1,127 additional VMT per day.

**Table 13: Analysis of Truckee TART Connect VMT Impacts - Summer 2023**

Total Passenger-Trips	30,826		
Average Group Trip Size	1.4		
Total Group Trips Served	22,099		
Total Passenger-Miles of Travel	105,859		
Average Passenger Trip Length on Truckee TART Connect	3.43	VMT	
Proportion of Passenger that would have driven	34.1%	-25,853	
Proportion of Passenger that would have used TNC/Taxi	8.8%	-13,343	
Total Avoided VMT on Microtransit		-39,196	
Proportion of passengers transferring to fixed route	3.3%		
Fixed Route Destination of Those Transferring	%	Trip Length (Mi)	
Tahoe City/West Shore	7%	14	-680
Kings Beach//North Shore	3%	12	-291
Northstar	3%	7	-170
Palisades	6%	11	-445
Truckee	81%	1.5	-886
<b>Total</b>	100%		-2,473
Total Avoided VMT on Microtransit and Fixed Route			-41,669
	<b>Total Truckee TART Connect VMT</b>		111,569
	<b>Net Change in Season VMT</b>		69,900
	<b>Net Change in Avg Daily VMT</b>		1,127

## ANALYSIS OF PARKING BENEFITS

Parking conditions are challenging in portions of Truckee, particularly in the Downtown commercial core during peak seasons. The Truckee TART Connect helps to alleviate demand for these limited spots by giving people an alternative mode for traveling Downtown. The benefits of the Truckee TART Connect service on Downtown parking are analyzed in this section for January and July 2023.

### January 2023

Based on the analysis of passenger origin/destination data presented in Chapter 3, it was determined that 4,202 total trips either started, ended, or were completed entirely within the Downtown service zone during January 2023. To estimate how many of these Truckee TART Connect trips resulted in less cars being parked in Downtown, the following steps were taken, as shown in Table 14:

- The total number of passenger-trips completed in January (10,242) was divided by the total number of rides (6,171) to determine the average group size of 1.7 passengers.
- The number of passenger-trips that either started, ended, or were made within the Downtown service zone (4,202) was divided by the average group size to estimate the total number of rides with at least one trip end occurring in the Downtown zone (2,532).
- The proportion of passengers that would have instead driven to complete their trip was identified from the winter in-app survey conducted by Downtowner (21 percent) and multiplied by the total number of groups that used Truckee TART Connect to get to/from the Downtown area to find how many car trips were avoided to/from Downtown. This number was then divided by 2 to account for round-trip travel. In all, 262 cars did not make the trip to/from the Downtown area, and therefore did not need parking due to the Truckee TART Connect service in January 2023.

**Table 14: Analysis of Truckee TART Connect Parking Benefits - January 2023**

Total Trips with Origin and/or Destination in Downtown Zone		4,202
Average Group Size		1.66
<hr/>		
<i>Total Groups Traveling To/From/Within Downtown Zone</i>		2,532
Proportion of Passengers Who Would Have Driven		21%
<b>Total Cars Not Parking in Downtown</b>		<b>262</b>
	<i>Proportion of Ridership</i>	<i>Total Cars Not Traveling to Downtown per Day</i>
Monday	14%	7
Tuesday	14%	7
Wednesday	14%	9
Thursday	15%	10
Friday	15%	10
Saturday	14%	9
Sunday	14%	7

To calculate how many parking spots were freed up by day of week, the proportion of ridership occurring on each day of the week during January 2023 was multiplied by the total number of cars that no longer traveled to the Downtown area, then divided by the number of times the day occurred during the month. The resulting numbers represent the average number of cars that no longer used limited Downtown parking by day of the week during January 2023. This analysis shows that the Truckee TART Connect service relieved the most parking demand on Thursdays and Fridays, when 10 less cars traveled to/from the Downtown Truckee service zone.

## **July 2023**

The same analysis of parking benefits was conducted for July 2023. The passenger origin/destination analysis presented in Chapter 3 found that 8,862 trips either started, ended, or were completed entirely within the Downtown service zone in July. Table 15 details how many of those Truckee TART Connect trips alleviated demand for parking in the Downtown Truckee service zone:

- The total number of passenger-trips completed in July (15,607) was divided by the total number of rides (10,850) to determine the average group size of 1.4 passengers.
- The number of passenger-trips that either started, ended, or were made entirely within the Downtown service zone (8,862) was divided by the average group size to calculate the total number of trips with at least one end in the Downtown zone (6,161).
- Based on the summer 2023 in-app survey, 19 percent of passengers would have driven instead if Truckee TART Connect were unavailable. This figure was multiplied by the total groups and divided by 2 to find that 592 cars did not make the trip to/from the Downtown zone in July 2023 because the people instead utilized Truckee TART Connect.

By day of week, the Truckee TART Connect had the greatest positive impact on Downtown parking congestion on Thursdays, on which an average of 25 cars no longer traveled to/from the Downtown service zone. This suggests that the Truckee TART Connect likely benefitted attendance at Truckee Thursdays, as parking was less of a constraint on whether people could attend. Other days of the week that saw a substantial benefit in parking demand included Tuesdays (-22 cars traveling Downtown), Wednesdays (-21 cars), and Fridays (-21 cars).

Given the constrained parking conditions in the Commercial Row area, it is worth considering the reduction in parking costs yielded by these reductions in parking demand. Assuming that half of the reduction in parking demand in the Downtown zone occurs in the historic core and that two-thirds of the daily parking demand occurs at one time, the data indicates there were 8 less parked vehicles in the Commercial Row area at peak times during July 2023 as a result of the Truckee TART Connect. Recent parking studies conducted for the Town have considered developing a public parking structure to serve this area, which could cost on the order of \$50,000 per space (depending greatly on the configuration of the structure, the availability of land, and other architectural details). Based on this cost estimate per space, the reduction in parking demand due to the Truckee TART Connect can be equated to capital cost savings on the order of \$400,000 by reducing the need for such a large facility project.

**Table 15: Analysis of Truckee TART Connect Parking Benefits - July 2023**

Total Trips with Origin and/or Destination in Downtown Zone		8,862
Average Group Size		1.4
<hr/>		
<i>Total Groups Traveling To/From/Within Downtown Zone</i>		6,161
Proportion of Passengers Who Would Have Driven		19%
<b>Total Cars Not Traveling to Downtown</b>		<b>592</b>
<hr/>		
	<u>Proportion of Ridership</u>	<u>Total Cars Not Traveling to Downtown per Day</u>
Monday	14%	20
Tuesday	15%	22
Wednesday	14%	21
Thursday	17%	25
Friday	14%	21
Saturday	14%	17
Sunday	13%	16

**OTHER BENEFITS**

The operations and performance data presented in this report suggest additional social and economic benefits that have been spurred by the Truckee TART Connect:

- The service **expands overall mobility** for Truckee residents and visitors. Considering the proportion of riders that would not have made their trip without microtransit being available, Truckee TART Connect serves an average of 33 roundtrips per day in winter that would not otherwise have been made and 35 in the summer. Many of these trips likely represent residents with mobility needs, such as those without access to a car or those with mobility limitations that preclude walking and biking.
- The service carries an estimated average of 33 residents per day to work in winter (assuming roundtrips on Truckee TART Connect) and 65 in the summer. This is a **benefit both to residents as well as to employers**.
- The use of the service by overnight visitors indicates a **benefit to the lodging industry**. Assuming overnight visitors make round trips on Truckee TART Connect, the program serves 12 overnight visitors per day in summer and 17 in winter.
- As 36 to 40 percent of trips are for shopping or dining, the microtransit program has helped generate a modest **increase in retail/restaurant sales** (and associated tax revenues).
- The Truckee TART Connect provides 25 daily roundtrips to restaurants/bars in winter and 37 in summer. Some of these trips reflect passengers who otherwise would have driven home under the influence, indicating a **traffic safety benefit**. This benefit is especially profound given that 50 percent of the fatal traffic accidents that occurred in Truckee during the last ten years involved alcohol.

## Chapter 7

# SUMMARY AND CONCLUSIONS

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This study reviewed the Truckee TART Connect microtransit service, including service characteristics, operations and performance data, passenger and public opinions, and the service’s community and environmental impacts. In this chapter, key findings from the review are summarized, and recommendations are made for how to further improve the Truckee TART Connect for future seasons.

## STUDY FINDINGS

### Service Characteristics

The Truckee TART Connect service was initiated in the summer of 2022 as a demonstration pilot. The service has since been extended until June 30, 2024 by the Truckee Town Council based on the program’s early success. The service area has been expanded to include all of Truckee town limits. Currently, Truckee TART Connect is available seven days a week during the following service hours:

- Summer and Winter – 6:30 AM to Midnight
- Spring and Fall – 6:30 AM to 10:00 PM

The Town of Truckee contracts with Downtowner, Inc., to provide microtransit service.



Note: Truckee TART Connect Van [Photo], sourced from the Town of Truckee

## Operations and Performance

### ***Ridership***

- Truckee TART Connect carried 184,979 passenger-trips from June 2022 through January 2024.
- Ridership has grown over time, with the winter 2023-24 season seeing the greatest ridership in the service's history so far; over 17,500 passenger-trips were completed per month during the winter 2023-24 season, or an average of 589 passenger-trips per day.
- During the winter 2022-23 season, ridership was greatest on the weekends. During the summer 2023 season, ridership was greatest mid-week. Summer ridership was highest on Thursdays due to the Truckee Thursdays street fair.
- In the winter 2022-23 season, most days saw ridership peaks at 8:00 AM, from 1:00 to 3:00 PM, and at 9:00 PM. In the summer 2023 season, hourly ridership remained high from 8:00 AM to 9:00 PM, with a slight peak at 3:00 PM.
- Most winter 2022-23 trips were made to, from, or within the Downtown or Tahoe Donner service zones. This pattern remained consistent during the summer 2023 season; however, an even greater proportion of summer trips were made to, from, or within Downtown. About 4 percent of trips were made either to, from, or within the Hospital zone during both the winter and summer, suggesting that year-round residents and workers have been able to use the service for important medical trips.

### ***Operating Costs***

- From June 2022 to January 2024, the Truckee TART Connect generated \$2.64 million in operating costs.
- So far, monthly costs were the greatest during summer 2023 (nearly \$200,000 per month), which was correlated to the expanded service hours, service area, and an increase in the number of vehicles available at one time.

### ***Performance***

- The Truckee TART Connect is quite productive for a microtransit service. From June 2022 through January 2024, the service carried 5.3 passenger-trips per vehicle service hour and 0.31 passenger-trips per service mile. The most productive season, so far, was winter 2022-23. The Truckee TART Connect has been more productive than the Truckee DAR (2.7 trips per vehicle service hour and 0.2 trips per vehicle service mile in FY 2022-23) and less productive than the Truckee Local Route (7.0 trips per vehicle service hour and 0.4 trips per vehicle service mile in FY 2022-23) The Truckee TART Connect has been slightly less productive than the Placer TART Connect microtransit service, which carried 7.8 passenger-trips per vehicle service hour from January through November 2023.
- Overall, the Truckee TART Connect cost per passenger-trip is \$14.26, however this cost has progressively decreased season-by-season as ridership has increased. This cost is substantially less than the FY 2022-23 cost per passenger-trip on the Truckee DAR (\$75.88) or the Truckee TART fixed routes (\$30.50). The Truckee TART Connect has thus far been slightly more expensive per passenger-trip than the Placer TART microtransit program (\$11.26 per trip).

## **Service Quality**

Overall, from January 1 to January 31, 2024, the microtransit service quality was as follows:

- 54 percent of rides were shared, up from 27 percent during the initial pilot phase.
- The average wait time was 26 minutes.
- 14 percent of pickups were made more than 5 minutes late.
- 32 percent of trips had a wait of 30 minutes or more.

By season, Truckee TART Connect service quality was generally lower in the winter 2022-23 season compared to the other seasons analyzed, in large part due to winter weather impacting road conditions as well as the reduced number of vehicles in operation.

## **Public Input**

There has been extensive public outreach conducted to learn more about how the Truckee TART Connect service is being utilized and perceived by passengers, residents, and visitors in the community. From the summer of 2022 through the early winter of 2023-24, Downtowner has conducted both in-app and email survey efforts, and LSC conducted a general, online community survey. Themes evident across the various survey efforts summarized in this report include:

- The majority of Truckee TART Connect riders are full-time Truckee residents.
- The top reasons why passengers use the service are to travel to/from social events, restaurants/bars, or work.
- Most Truckee TART Connect passengers only occasionally use TART fixed routes, if at all.
- Most community members are aware of the service, and had initially heard of it either from family, friends, colleagues, or social media.
- People think highly of the Truckee TART Connect, with most respondents in multiple survey efforts indicating they would recommend the service to others.
- The proportion of respondents who complained about service reliability and overall wait/travel times has increased progressively over time as demand for the service has grown.

It should be noted that in earlier survey efforts, many respondents requested that both the Truckee TART Connect service area and service hours be expanded. Most of these requests have since been addressed by expanding the service area to include all of Truckee town limits and by extending the service hours.

## **Service Impacts**

### ***VMT***

The Town of Truckee intends to reduce the number of VMT generated within the community. So far, the Truckee TART Connect has not advanced this sustainability goal. During the winter 2022-23 season, the Truckee TART Connect service generated a net increase of 59,735 VMT, or 558 additional VMT per day. During the summer 2023 season, the Truckee TART Connect generated a net increase of 69,900 VMT, or 1,127 VMT per day. The relative air emission impact of the Truckee TART Connect VMT will decrease once the service is operated with zero-emissions vehicles (ZEVs).

## ***Parking Demand***

A benefit of the Truckee TART Connect is the reduction of demand for limited parking in the Downtown zone by transporting people to/from the area that would have otherwise driven themselves. During the winter 2022-23 season, the Truckee TART Connect service prevented 262 cars from needing to make the roundtrip to/from Downtown, or 7 to 10 cars per day. During the summer 2023 season, 592 cars no longer made roundtrips to/from Downtown, or the equivalent of 16 to 25 cars per day.

## ***Mobility***

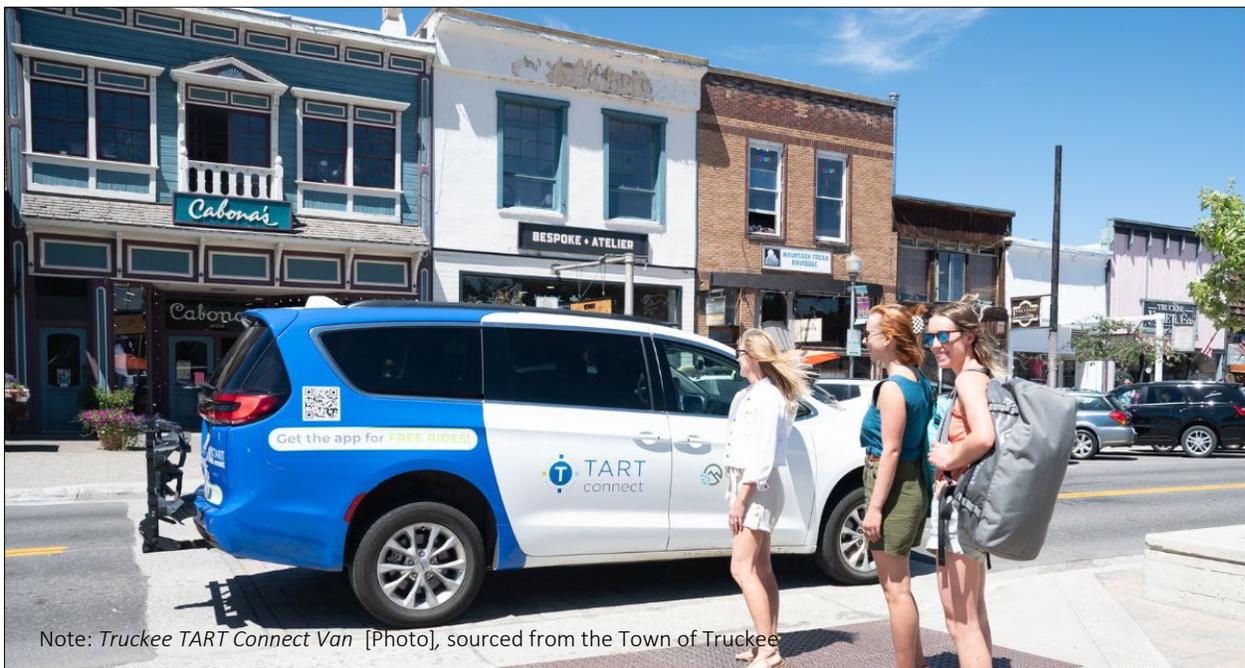
Based on the passenger survey data presented in Chapter 4, the Truckee TART Connect has significantly increased mobility access within the Town; a large proportion of passengers indicated that they would have been unable to make their trip without microtransit being available, suggesting the service is helping a number of people who are likely transit dependent to get where they need to go.

## ***Economy***

The Truckee TART Connect has benefitted the local economy by helping overnight visitors travel to/from local attractions, as well as by helping residents and visitors alike complete shopping, dining, and other recreational trips. Additionally, the service helps a large number of people commute to/from work, helping both residents and employers.

## ***Safety***

The passenger survey data presented in Chapter 4 indicates that a large number of Truckee TART Connect trips are made to/from restaurants or bars. In the general community survey, discussed in Chapter 5, one of the top reasons cited for riding the service was to get home safely while under the influence. These data points suggest that the Truckee TART Connect has likely improved traffic safety within the Town by providing people with an alternative to driving under the influence.



Note: Truckee TART Connect Van [Photo], sourced from the Town of Truckee

## **Latent Ridership Demand**

It is clear from the performance data and public input that there is the potential for significant additional ridership if the capacity of the program could be expanded to reduce wait times. Beyond the number of people who book and then do not complete a trip, there is an unknown number of people who use the app to find the wait time and then choose to not book a trip at all. Given that there is no fare and considering the high level of awareness of the service, the only factor limiting Truckee TART Connect ridership is the occasionally long wait times that make the service less convenient than driving. Ridership would likely continue to increase as funding (and thus vehicles in operation) increases within any foreseeable budget. This in turn makes the appropriate level of service (and thus ridership) a public policy decision regarding the appropriate level of public funding that should be allocated for the program.

## **POTENTIAL SERVICE MODIFICATIONS**

### **Reduce Evening Service Hours on Low-Demand Days During Peak Seasons**

During the peak winter and summer seasons the Truckee TART Connect is available seven days per week from 6:30 AM to 12:00 AM. While a consistent schedule is easy for passengers to understand, Truckee TART Connect ridership varies significantly by day of week, as well as by hour. A consistent trend across both the winter and summer seasons was that ridership dropped measurably in the final hours of the service day, albeit this drop was more significant during the winter compared to summer.

To reduce operating costs, peak season service hours could be modified to be 6:30 AM to 10:00 PM on Monday through Wednesday and 6:30 AM to 12:00 AM on Thursday through Sunday. This schedule would still be able to serve most passengers while eliminating low-productivity service hours.

### **Establish a Minimum Trip Distance**

One strategy to improve the number of VMT generated by the Truckee TART Connect would be to establish a minimum trip distance. Prohibiting short distance trips could improve the service's net impact by no longer serving trips that generate high transit VMT but result in only low reductions in private vehicle VMT. As discussed in Chapter 3, less than 1 percent of Truckee TART Connect trips are 0.25 miles or shorter, therefore establishing a minimum trip requirement of 0.25 miles would have a minimal impact on ridership, while improving operational efficiency.

### **Limit Service to Glenshire Zone to Specific Time Windows**

During July 2023, only 12 percent of trips either started, ended, or were made entirely within the Glenshire zone. Limiting service to the Glenshire zone to specific time windows, such as the first 15 minutes of the hour, would likely improve Truckee TART Connect efficiency by increasing the number of passengers carried per trip to/from Glenshire and freeing up driver time. This model could also be considered by the Town as part of the *2024 Truckee Transit Development Plan* in regards to the Northstar night service.

### **Establish a Stricter No-Show Policy**

No-show rates for traditional paratransit services are typically in the 2 to 3 percent range. Currently, about 7 percent of Truckee TART Connect trips are no-shows. Reducing this existing 7 percent no-show rate to 3 percent could reduce annual costs by approximately \$60,000. While there are already policies in place to discourage passengers from skipping their trip, these policies could be strengthened to further discourage passengers from no-showing.

### **Strategies to Increase Parking Benefits**

To further decrease parking congestion demand and congestion and VMT associated with searching for parking in Downtown Truckee, more people who typically drive themselves need to instead opt for using Truckee TART Connect. Three strategies to achieve this outcome are discussed in this section.

#### ***Increase Downtown Parking Rates and Paid Parking Hours***

The first strategy for encouraging more people who drive to Downtown to instead use microtransit is to increase the costs associated with parking, either by increasing parking rates or by expanding how many hours paid parking is required. Increasing the cost of parking would likely deter people from driving and encourage some to instead schedule a free ride on Truckee TART Connect. Enforcing paid parking requirements into the evening hours would also likely have a similar effect. While likely effective, this strategy would also probably face resistance from community members. To minimize impacts on year-round workers, the employee parking permit rates could remain unchanged.

#### ***Improved Marketing***

To increase the proportion of trips made to/from Downtown on microtransit, marketing could be improved by both increasing the number of marketing efforts, and by developing marketing materials that explicitly state the cost and time benefits of not needing to park Downtown. Marketing materials could consist of print flyers and social media posts, among other mediums. Additionally, advertisements could be targeted to promote the parking benefits of taking Truckee TART Connect to those visiting during time periods when parking is extremely limited, such as Truckee Thursdays.

#### ***Improved Reliability***

It is likely that more people who normally drive themselves to/from Downtown Truckee would instead use microtransit if they perceived the service as being just as quick and reliable as taking their personal vehicle. As previously discussed in Chapter 3, 32 percent of Truckee TART Connect trips made from January 1, 2023, through January 31, 2024, had wait times of 30 or more minutes. To convince more people of the reliability of microtransit and encourage them to ride, wait times should be reduced however possible. Service options to achieve this goal include allowing standing reservations for regular riders, deploying additional vehicles, assigning vehicles to operate solely within the Downtown zone, and limiting trip distances to reduce total demand and free up time for drivers to make other, longer trips.

## POTENTIAL PASSENGER FARE

An option to improve the long-term sustainability of the Truckee TART Connect program (particularly if other new funding sources do not materialize) would be to implement a fare. While a wide range of fare policies could be considered, a reasonable option would be a \$2.00 fare per one-way trip for the general public, with a \$1.00 fare for seniors, youth, and persons with disabilities. Assuming this fare level, the financial and ridership impacts can be estimated as follows:

- Reviewing ridership by month, and particularly the 85 percent increase in January 2024 ridership over January 2023, annual total ridership going forward is expected to be approximately 190,000.
- There are no specific studies of the impact of putting a fare on a previously free microtransit program (particularly in a resort setting). There are quite a few other transit systems that have gone from fare to free (Placer TART, Corvallis OR, and Missoula MT being some). They report an average of roughly 45 percent increase in ridership due to the elimination of fare. In the other direction, this is equal to roughly a 30 percent decrease in ridership if a reasonable fare is added. Given the latent demand, at least a third of this 30 percent reduction would be replaced by new riders drawn by the improved response times (assuming the contracted service levels do not drop), so at most there would be a 20 percent reduction in ridership.
- Truckee TART Connect ridership with a \$2.00 base fare would therefore be approximately 151,000 boardings per year.
- Given the surveyed percentage of youth, elderly, and disabled ridership, the average revenue per boarding would be roughly \$1.80.
- $151,000 \times \$1.80$  yields \$272,000 per year (rounded) in fare revenues.

Compared with the current annual operating costs, this means that a \$2.00 base fare would cover approximately 10 percent of costs. While a benefit, a fare (unless it is so high to have substantial equity issues) would clearly not come close to eliminating the need for financial subsidies for the program.

As with any fare program, there would be options to consider such as monthly or seasonal passes at discounted rates. One option would be to set a relatively high fare for single rides (like \$4.00 or \$5.00) but then deep discounts for multiride instruments such as 20-ride or monthly passes to provide a significantly lower per-ride cost for local residents and workers. If a fare is implemented on the Truckee TART Connect, it would be appropriate to continue to offer fare-free fixed route service to encourage a shift to the fixed route, which does not incur incremental costs with additional ridership.

## SHORT-TERM RECOMMENDATIONS

Many of the short term recommendations made in the *Truckee Microtransit Study (2023)* have already been implemented by Truckee TART and the Truckee Town Council.

- Truckee TART Connect has been expanded to provide service town-wide.
- Service hours have been extended to 6:30 AM to 10:00 PM in the spring and fall and 6:30 AM to 12:00 AM in the summer and winter.
- The program has been extended through June of 2024, with Downtowner continuing to be the contractor through that time.

- A general public survey was conducted in the early winter 2023-24 season to gain further feedback regarding the expanded service options (discussed in Chapter 5).

New recommendations made as a result of this study are as follows:

- Evaluate the ridership and cost impacts of reducing service hours to end at 10:00 PM on Monday through Wednesday during the peak summer and winter seasons.
- Establish a minimum trip length requirement of 0.25 miles, for persons without disabilities.
- Evaluate the impacts of limiting service to the Glenshire zone to a portion of each hour (such as the first 15 minutes of the hour).
- Establish a stricter no-show policy and start enforcing the policy for persons that are no-shows for multiple trips.
- Evaluate strategies to reduce wait times, with the intention of increasing the overall reliability of the service. Possible strategies may include establishing policies to allow “standing reservations” for regular riders, adding additional drivers and vehicles, or assigning vehicles to specifically serve high traffic service zones. This could also include dedicating vehicles to make connections to Placer TART fixed route buses at the Truckee Mobility Hub, such as standing runs between the Hub and affordable housing complexes during commute periods.
- Develop marketing campaigns targeted at vehicle-owners discussing the benefits of taking Truckee TART Connect and no longer needing to pay for or look for parking in the Downtown area.
- Continue to provide fuel to the microtransit operator for the Town rate at the public works facility, consistent with the fall 2023 contract modification with Downtowner.

Other recommendations made in the *Truckee Microtransit Study* that are recommended again in this review are as follows:

- Monitor service performance closely, including by conducting seasonal passenger surveys to assess passenger satisfaction and needs.
- Continue to operate the current fixed route service.
- Continue to offer Truckee Thursdays shuttles.
- Provide two transit vans from the Town-owned fleet to Downtowner for operation of microtransit service. Maintenance of these vans should remain a Town function, as well as fueling at the Town facility. This will reduce costs to Downtowner and in turn to the Town.
- Improve marketing with the following efforts:
  - Create updated marketing materials to distribute throughout the community. One material could be flyers with the new service details and a QR code directing people to the website and booking app.
  - Continue to reach out to homeowner associations with updated information.
  - Continue to reach out to lodging property staff, including visits to the major lodging properties on at least a quarterly basis.
  - Increase awareness among short-term rental visitors by working with property management firms to provide information on the program as part of their marketing and pre-visit materials.

- Expand presence on social media, particularly in the summer and winter seasons.
- Partner with Downtown businesses and the Truckee Downtown Merchants Association to encourage ridership.
- Partner with large local event organizers (Truckee Thursdays, Farmers Markets, Brewfest, Music in the Park) to post the Truckee TART Connect information with their typical marketing announcements (social media, flyers, radio announcements, etc.).
- Hold discussions with Placer County about the potential for the County to provide funding for the Truckee TART Connect program to serve areas immediately adjacent to Truckee as part of the Truckee zone:
  - Residences along the south shore of Donner Lake, such as along Conifer Drive.
  - The southern portion of the Donner Creek mobile home park at the western end of West River Street.
  - The southern portions of the Ponderosa Palisades neighborhood, such as along Silver Fir Drive and Thelin Drive.
  - Other areas of Martis Valley along Schaeffer Mill Road, including the Hawkins Village and Meadow View Place neighborhoods.

## DISCUSSION OF LONG-TERM POTENTIAL STRATEGIES

To ensure the long-term sustainability of the microtransit service, the following strategies should be prioritized. Many of these strategies are already in the process of being implemented by the Town, including the procurement of new ride-booking software, the purchase of vehicles, and the development of the *2024 Truckee Transit Development Plan*.

- **Pursue additional funding sources**, such as expanded local sales tax revenues, increased parking program revenues, and/or additional State Transit Assistance funding.
- **Pursue purchasing a fully Town-owned microtransit fleet**. As grant funding and vehicle availability allows, the Town should purchase battery electric vans to further support Town sustainability goals and to comply with the California Innovative Clean Transit rule.
- Consult with Caltrans and the Federal Transit Administration, as necessary, to modify existing funding agreements to **allow for utilization of existing transit funding sources for the microtransit service** model.
- Consider implementation of a **fare** on TART Connect.
- **Evaluate service alternatives** related to the Truckee TART Connect in the *2024 Truckee Transit Development Plan* that is currently under way, including the following options:
  - Eliminate fixed route service to the West End Beach area of Donner Lake (west of Coldstream) and instead serve the area solely with microtransit.
  - Operate a second fixed route bus to provide half-hourly service during some, or all, of the current service day to better facilitate transfers from microtransit to the fixed route.
  - Assess potential for Downtown or Tahoe Donner shuttle routes.

- Administration and management alternatives for operating a comprehensive fixed route/paratransit/microtransit service starting in July 2024. It is likely that the final recommendation made in the TDP will require the Town of Truckee to issue a Request for Proposals to find a contractor who can operate the integrated services. This could also be done in coordination with Placer County through a joint solicitation.
- Procure ride booking software to advance the possibility of the Town providing a comprehensive fixed route/paratransit/microtransit service through the existing transit operations contract with Paratransit Services.
  - Assess ridership on the Truckee Thursdays shuttles compared to the capacity of Truckee TART Connect service to identify if there are shuttles that can be replaced with microtransit vans without impacting overall Truckee TART Connect service quality.
  - Provide paratransit service as part of the microtransit program, rather than the current separate dial-a-ride service. This service model is also referred to as “co-mingled” services. The following modifications would be needed:
    - “Standing reservations” will need to be established for recurring ADA program trips.
    - Microtransit drivers and dispatchers will need to be trained in serving persons with disabilities, in accordance with the Federal Transit Administration Circular C 4710.1. This should include training in driver responsibilities under the ADA, proper wheelchair handling and securement and working with persons with disabilities.
    - Additional tracking and reporting will be needed specifically for ADA trips.

## INTRODUCTION

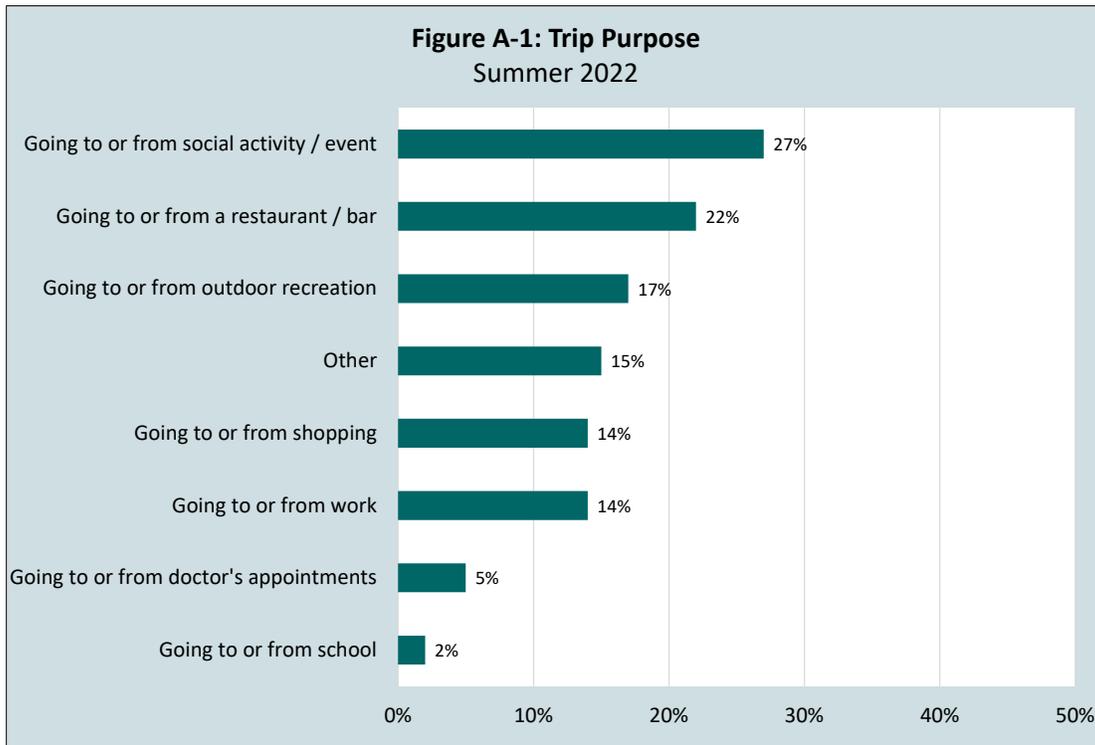
This Appendix reviews in-app survey data gathered by Downtowner, Inc. regarding the Truckee TART Connect microtransit program.

## SUMMER 2022

In all, 815 passengers responded to the in-app survey during the initial summer pilot.

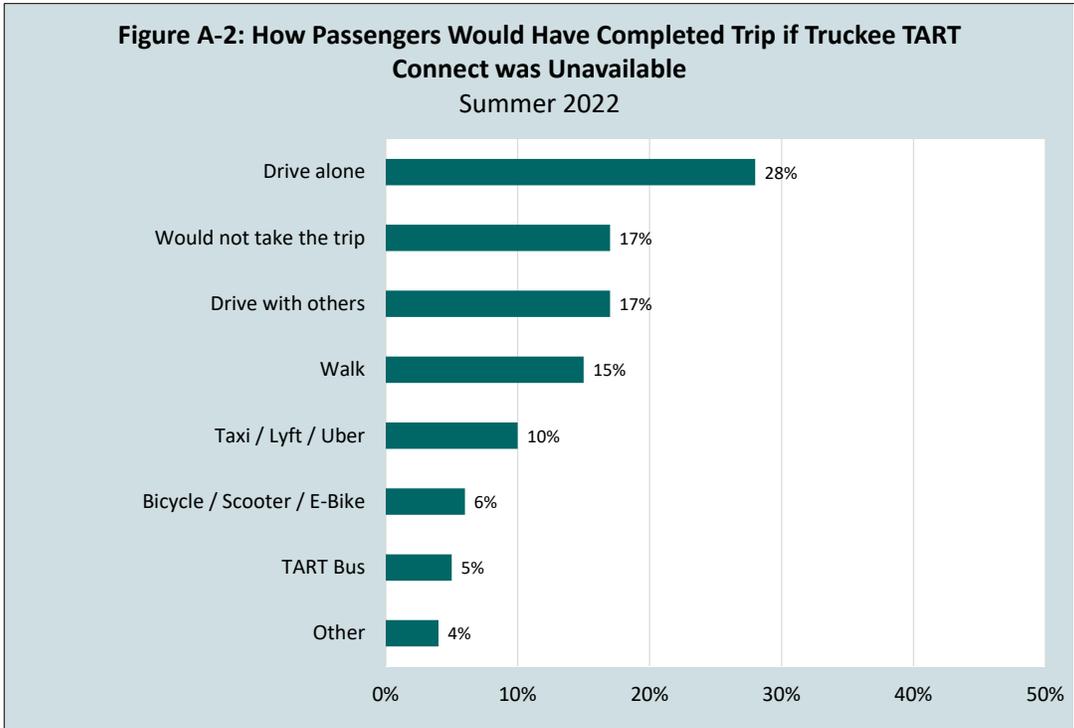
### Q1: Trip Purpose

Truckee TART Connect was largely used for social / recreation and dining purposes (a total of 66 percent), while 14 percent were commuting to/from work and 14 percent were going shopping (Figure A-1). Note that the hours of service (starting at 10 AM) made TART Connect less useful for work trips.



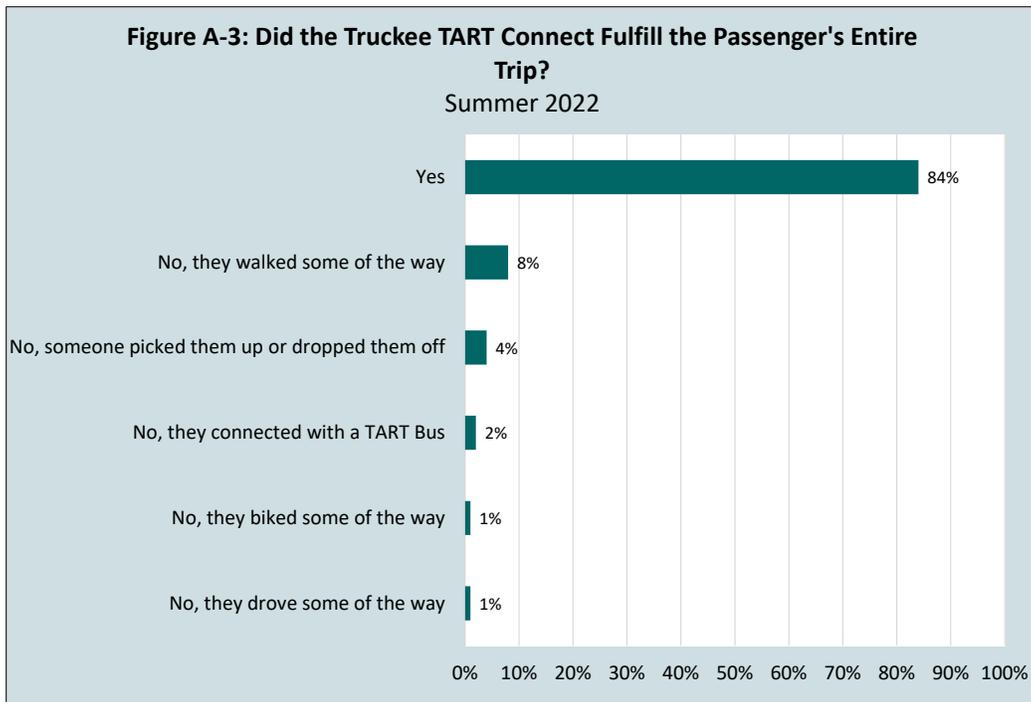
### Q2: Travel Mode Shift

A key factor in assessing the overall benefit of the service is defining how passengers would otherwise have traveled. As shown in Figure A-2, most passengers would have driven (either alone or with others) or used a taxi/Uber/Lyft (a total of 60 percent). 15 percent would have walked, 6 percent would have biked, 5 percent would have taken a bus, and 17 percent would not have made the trip at all.



**Q3: Travel Mode Connections**

It is also useful to assess how the microtransit service is fitting into the overall travel network ... particularly to the degree that passengers are using other modes, such as fixed route transit services. The below figure shows how the large majority of passengers used Truckee TART Connect for their entire trip, with only 2 percent connecting to a fixed route. Another 8 percent walked or biked as part of their trip.

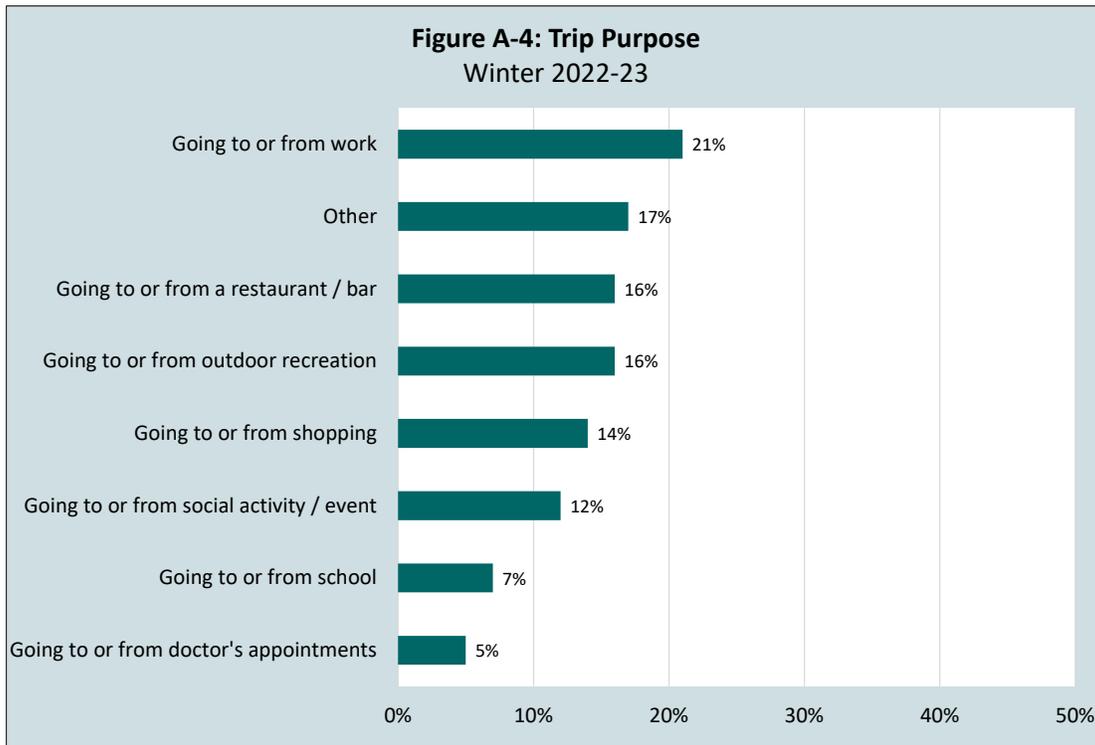


## WINTER 2022-23

Over the course of the winter 2022-23 season, 480 passengers responded to the in-app survey offered by Downtowner. Overall, 480 passengers responded. The winter season results are summarized in this section and compared to the summer results.

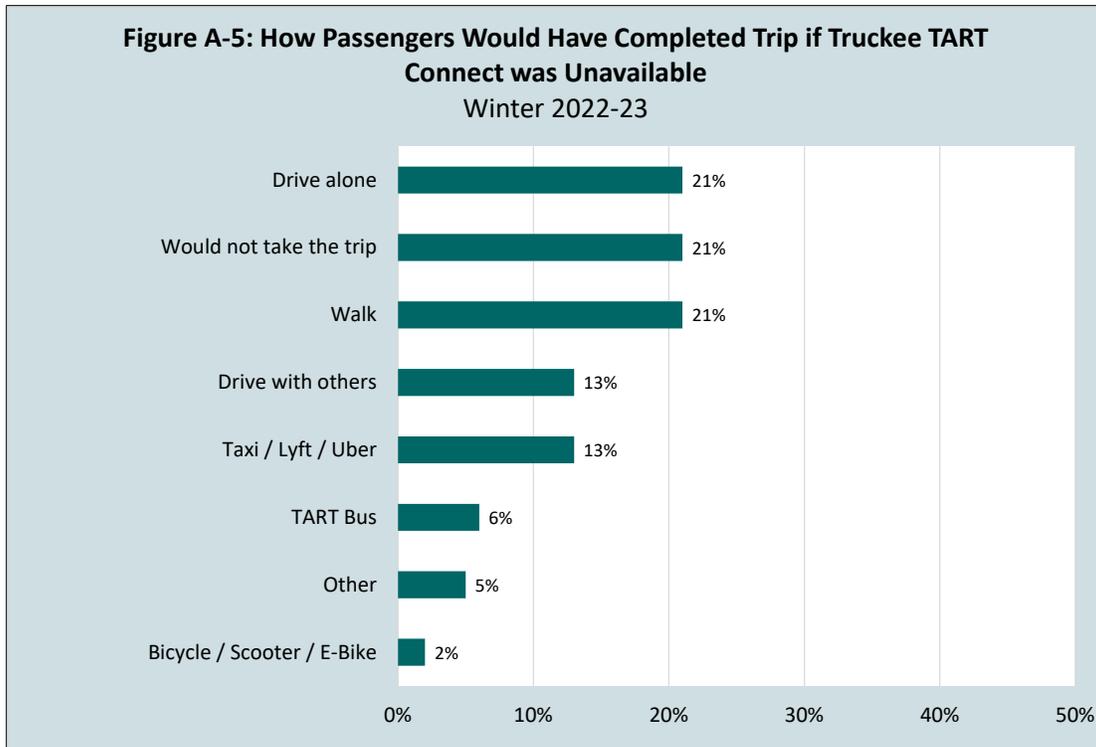
### Q1: Trip Purpose

More passengers reported riding Truckee TART Connect to and from work during the winter compared to the previous summer (+7 percent), while less people reported traveling for social/recreation and dining purposes (-22 percent). The most common trip purposes included going to/from work (21 percent), restaurants or bars (16 percent), or outdoor recreation (16 percent) (Figure A-4).



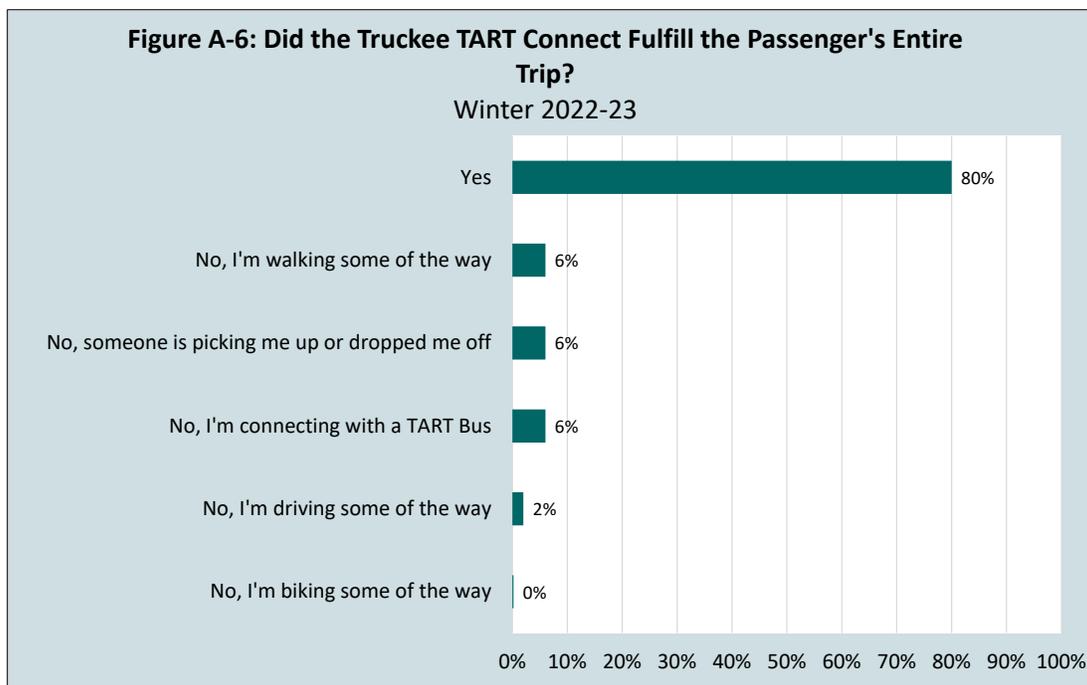
### Q2: Travel Mode Shift

As shown in Figure A-5, if the Truckee TART Connect was unavailable, 21 percent of passengers would have made their trip by driving alone, 21 percent would have not made the trip at all, and 21 percent would have walked. Very few passengers said they would have biked, likely due to the different weather and road conditions compared to summer.



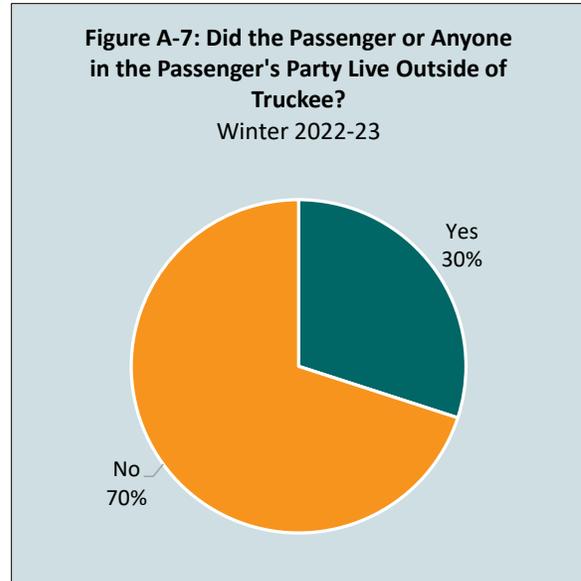
**Q3: Travel Mode Connections**

Similar to the previous summer, the majority of passengers who participated in the in-app survey during the winter 2022-23 season used Truckee TART Connect for their entire trip (80 percent), as see in Figure A-6. 6 percent used TART Connect to transfer to another TART bus, a slight increase from the summer (+4 percent). 6 percent walked and another 6 percent got a ride as part of their trip.



#### **Q4: Truckee Residency Status**

The winter in-app survey included a question asking whether or not the passengers, or anyone else in their party, live outside of Truckee. This question was intended to gather information on whether riders are primarily local residents or tourists. As evidenced by Figure A-7, the majority of passengers/groups lived in Truckee (70 percent), while the remainder were riding with at least one person who was visiting the area.



### **SUMMER 2023**

Another 346 Truckee TART Connect passengers completed the in-app survey during the summer of 2023. The summer 2023 survey results are presented in this section, as well as compared to the previous two in-app surveys conducted during the summer 2022 and winter 2022-23 seasons.

#### **Q1: Trip Purpose**

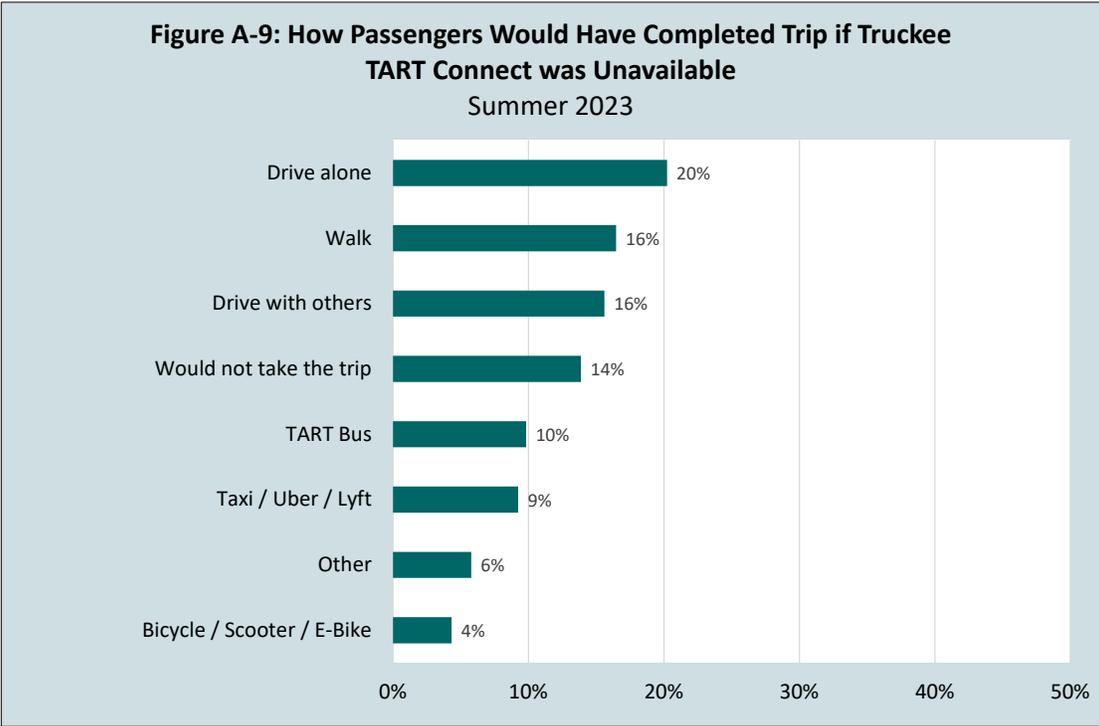
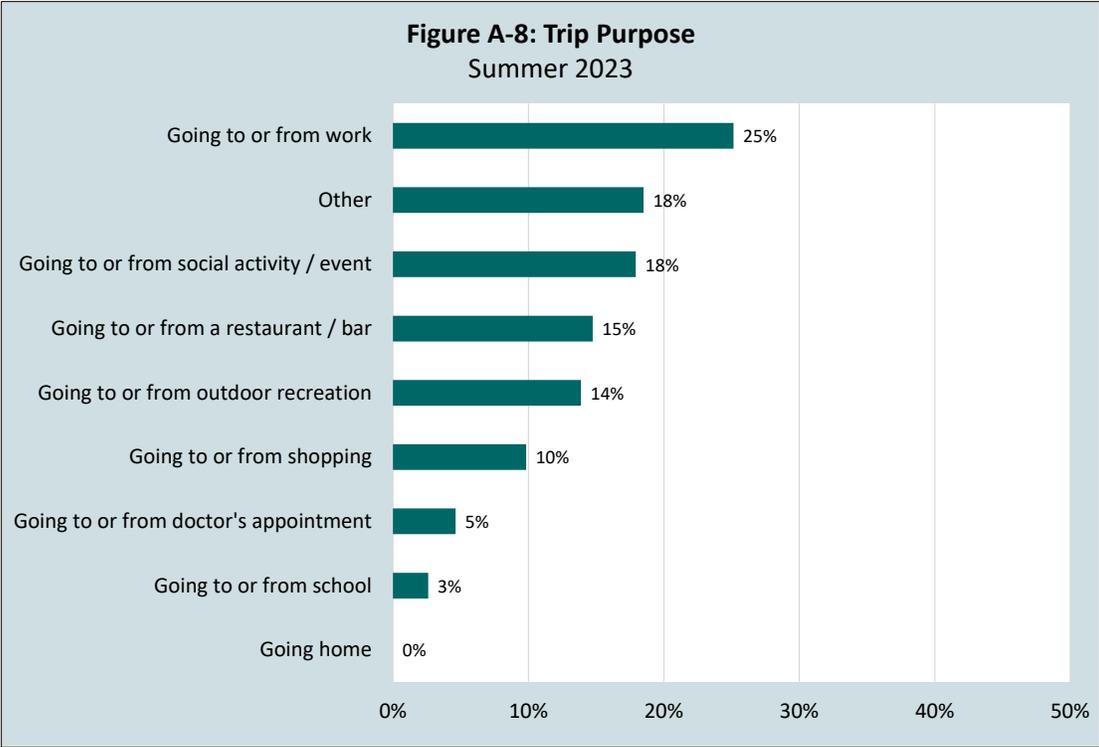
The proportion of passengers who were riding Truckee TART Connect either to or from work increased compared to both the winter (+4 percent) and previous summer (+11 percent) (Figure A-8). 47 percent of passengers were traveling for social/recreation and dining purposes, a slightly greater proportion compared to the winter passengers (+3 percent) but far less compared to the previous summer (-19 percent). Overall, the top trip purposes were as follows: traveling to or from work (25 percent), social activities or events (18 percent), or restaurants and bars (15 percent).

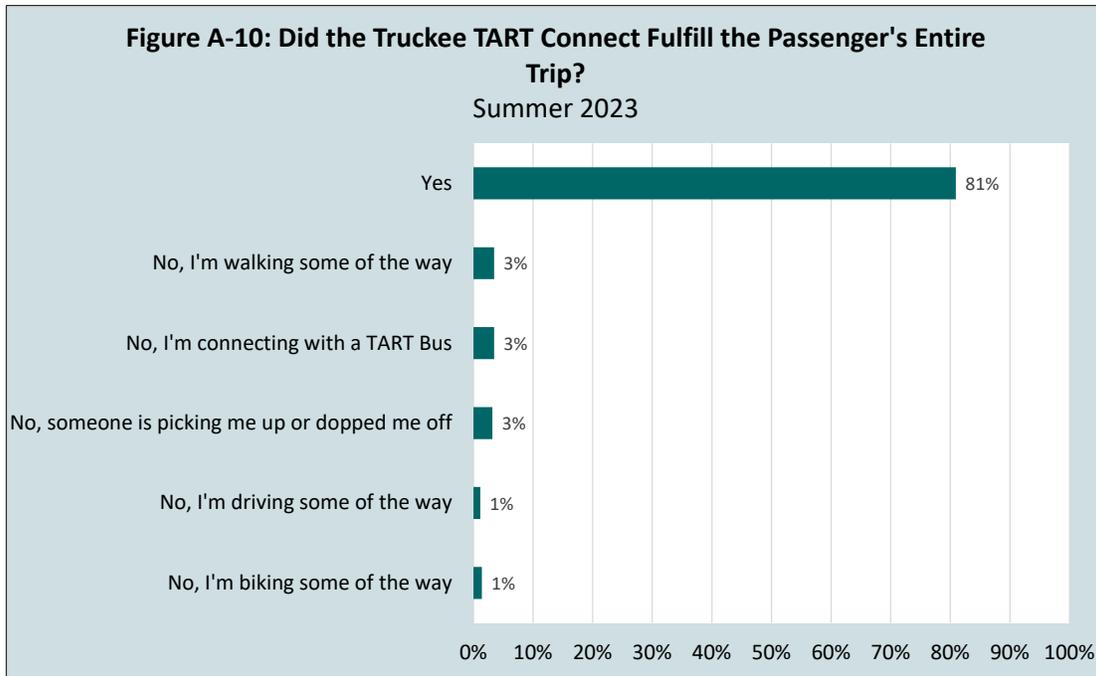
#### **Q2: Travel Mode Shift**

A similar proportion of passengers compared to the other seasons reported that they would have driven themselves if they had been unable to take the Truckee TART Connect service (20 percent). Additionally, 16 percent would have instead walked, 16 percent would have driven with others, and 14 percent would have not made their trip (Figure A-9).

#### **Q3: Travel Mode Connections**

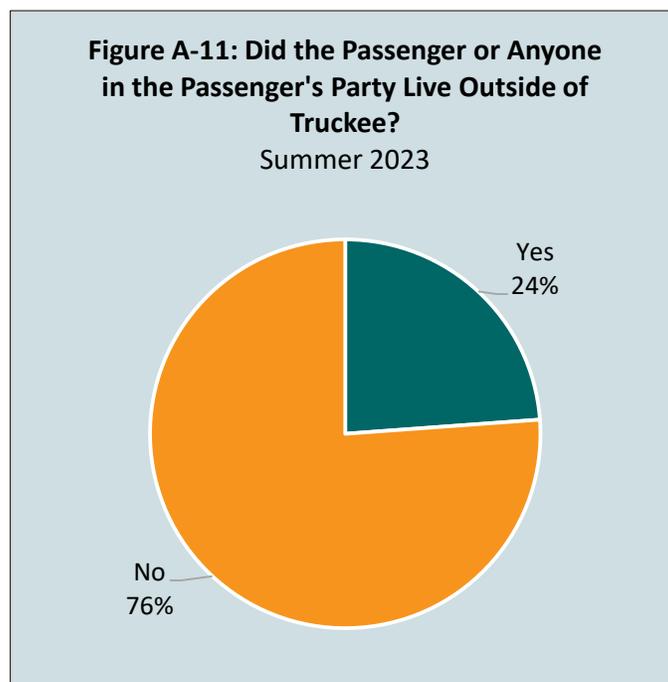
During the summer 2023 season, 80 percent of passengers reported they used the Truckee TART Connect for their entire trip, as seen in Figure A-10. This is the same proportion as the winter survey and only 3 percent less than the previous summer survey. Only 3 percent transferred to another TART bus, similar to the summer of 2022 (+1 percent) and slightly less than the winter season (-3 percent).





**Q4: Truckee Residency Status**

The summer 2023 in-app survey also included a question asking whether the passenger, or anyone else in their party, lives outside of Truckee. Consistent with the winter results, the majority of passengers/groups who participated in the survey live in Truckee (76 percent) (Figure A-11).



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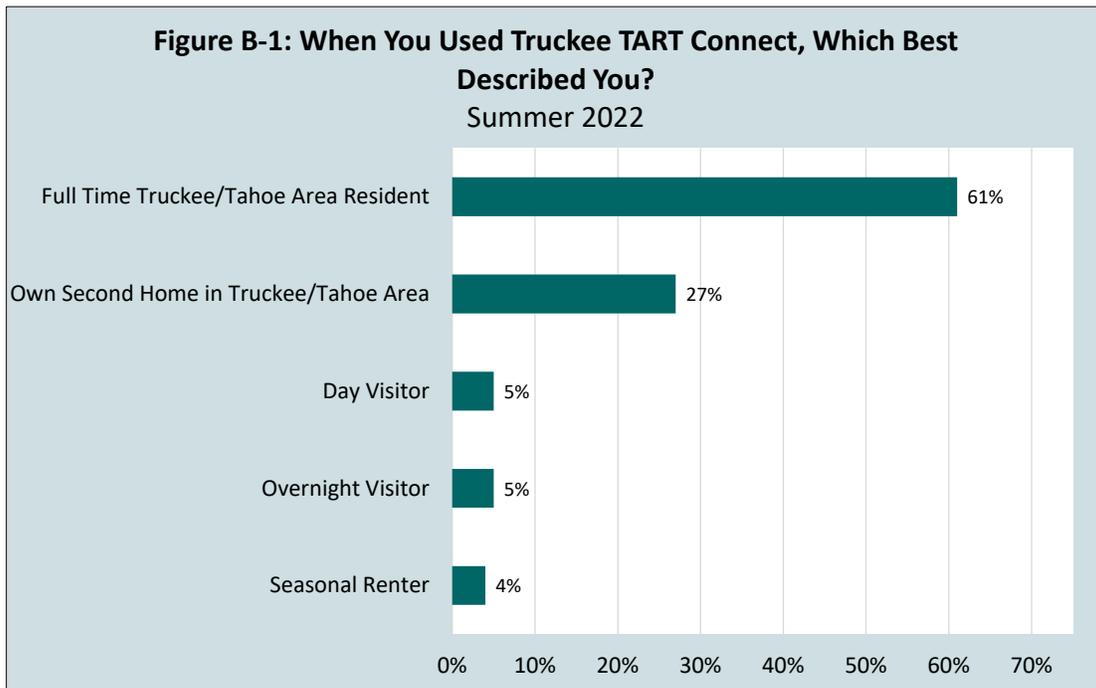
**PASSENGER EMAIL SURVEY RESULTS**

**SUMMER 2022**

During the summer months of 2022, Downtowner distributed a survey via email to registered passengers in order to learn more about rider perceptions and opinions of the Truckee TART Connect. A total of 282 people participated in the survey. The following is a brief summary of the responses.

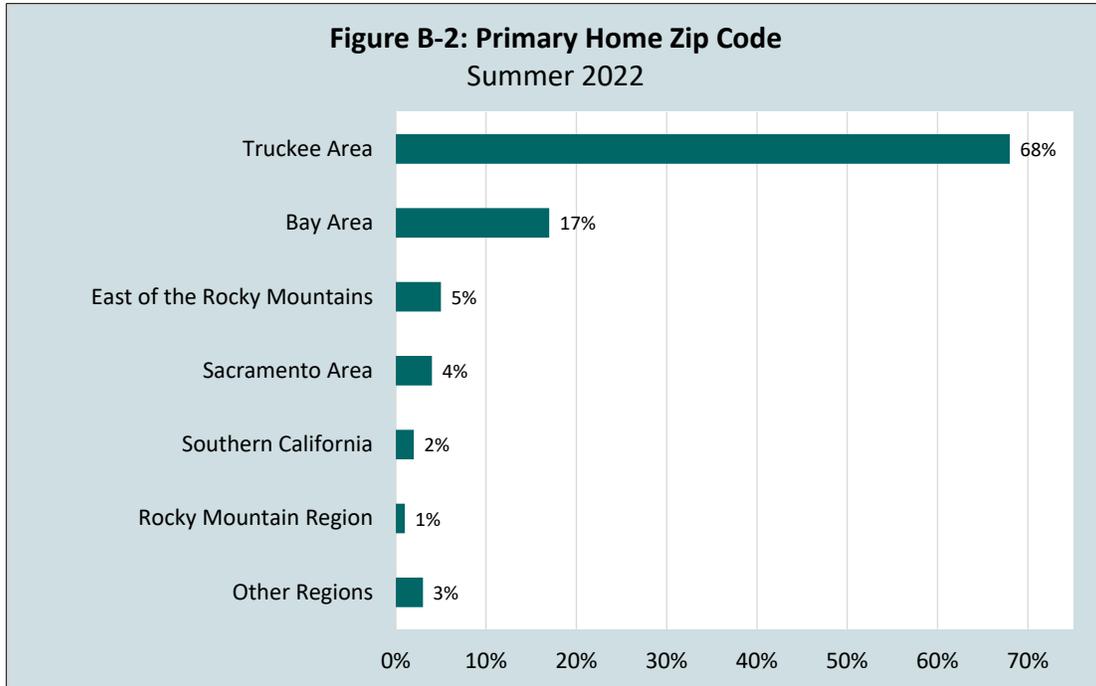
**Q1: Resident or Visitor Type**

When asked how people identified, 61 percent of respondents were full-time permanent Tahoe/Truckee residents, followed by 27 percent who own a second home in Truckee. Visitors to Tahoe/Truckee area for the day as well as overnight visitors each made up 5 percent, respectively. Summer seasonal renters made up 4 percent of the total responses. This data is presented in Figure B-1.



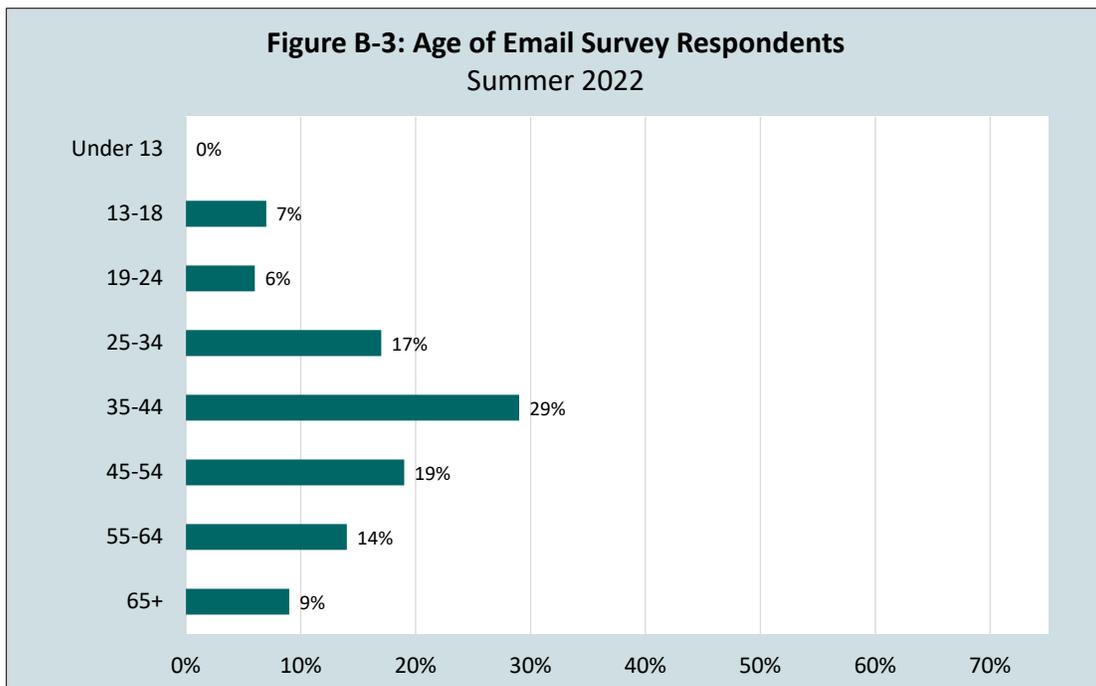
**Q2: Home Zip Code**

Figure B-2 shows the summer survey respondents' home zip codes. 68 percent of respondents reported they were from the Truckee, California (CA) area (96161 and 96160). Those with zip codes from the Bay Area accounted for 17 percent of respondents. Other respondents were visiting from the following regions; east of the Rocky Mountains (5 percent), Sacramento Area (4 percent), Rocky Mountain Region (1 percent), or other regions that made up less than 1 percent of participants (3 percent).



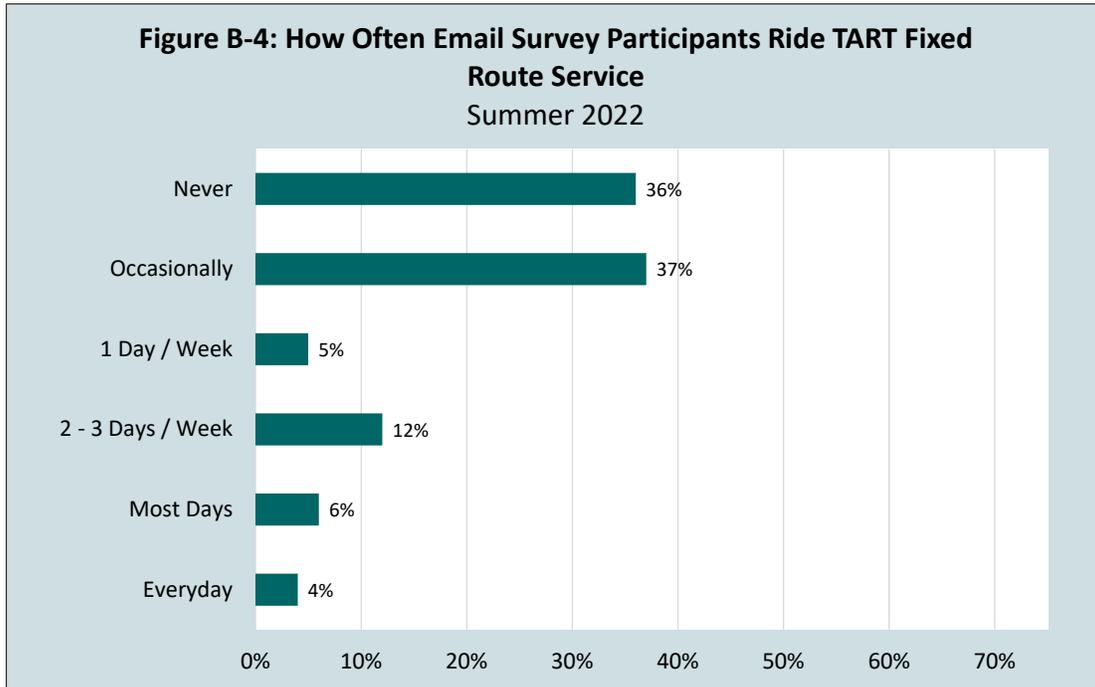
**Q3: Ages of Respondents**

The largest proportion of the survey participants were aged 35 to 44 (48 percent), as shown in Figure B-3. Ages 13 to 24 made up only 13 percent of participants, and ages 65 and above made up only nine percent of ridership. Ages 25 to 34 accounted for 17 percent of ridership.



#### **Q4: TART Fixed Route Ridership Frequency**

Of those who responded, 5 percent took TART fixed route bus service one day a week. Every day riders made up 4 percent. Riders who ride the bus most days made up 6 percent. Riders who take the bus 2 to 3 days per week account for 12 percent of respondents. Respondents who have never taken TART fixed route bus services account for 36 percent of respondents. Those who occasionally take TART fixed route bus service account for 37 percent of participants. This data is shown in Figure B-4.



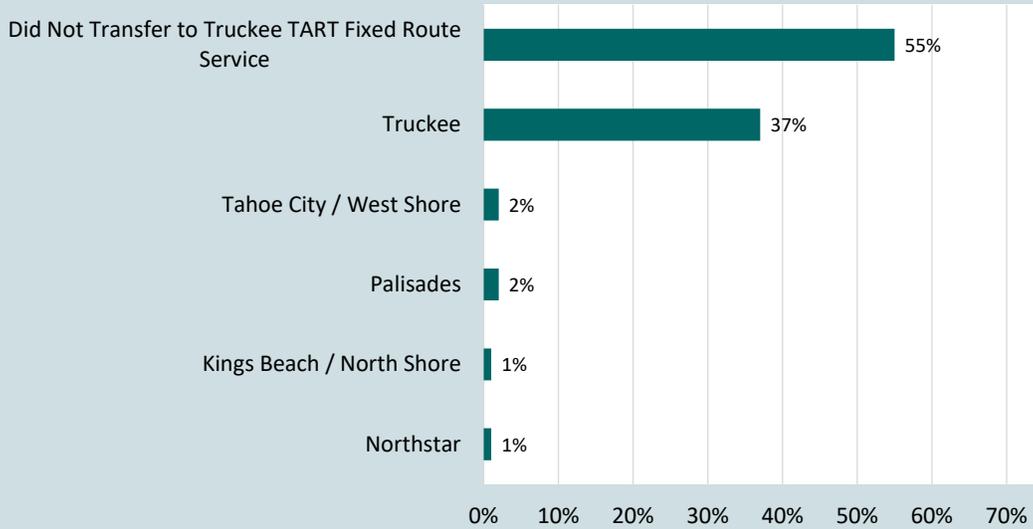
#### **Q5: Final Destinations of Passengers who Connected to TART Fixed Route Bus from TART Connect**

The email survey asked passengers where they had traveled to on TART fixed route buses after transferring from Truckee TART Connect. 60 percent indicated this question was not applicable, and that they did not connect to TART fixed route services (Figure B-5). More than 37 percent indicated the end of their trip was in Truckee. The remaining 8 percent indicated the end of a fixed route trip were Tahoe City/West Shore, Kings Beach/North shore, or Palisades.

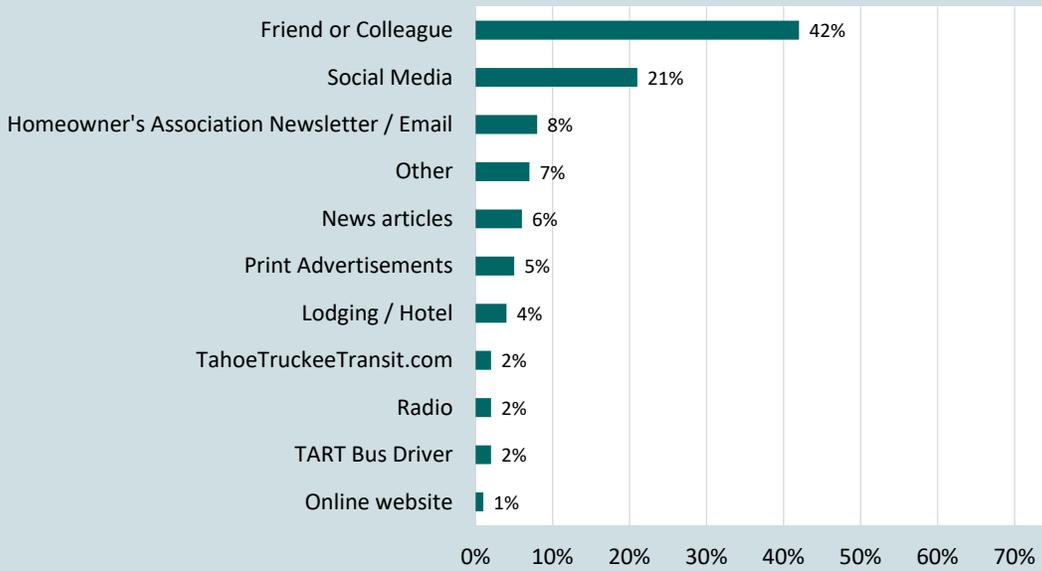
#### **Q6: How Passengers Heard About Truckee TART Connect Service**

Figure B-6 shows how respondents heard about the service; the top responses were friend or colleague (42 percent), social media (21 percent), or Homeowners Association newsletter/email (8 percent). The radio and online website were the least popular ways of hearing about the survey at 2 percent and 1 percent, respectively.

**Figure B-5: Destinations Traveled to on TART Fixed Route Services After Transferring from TART Connect  
Summer 2022**



**Figure B-6: How Passengers Learned About Truckee TART Connect  
Summer 2022**

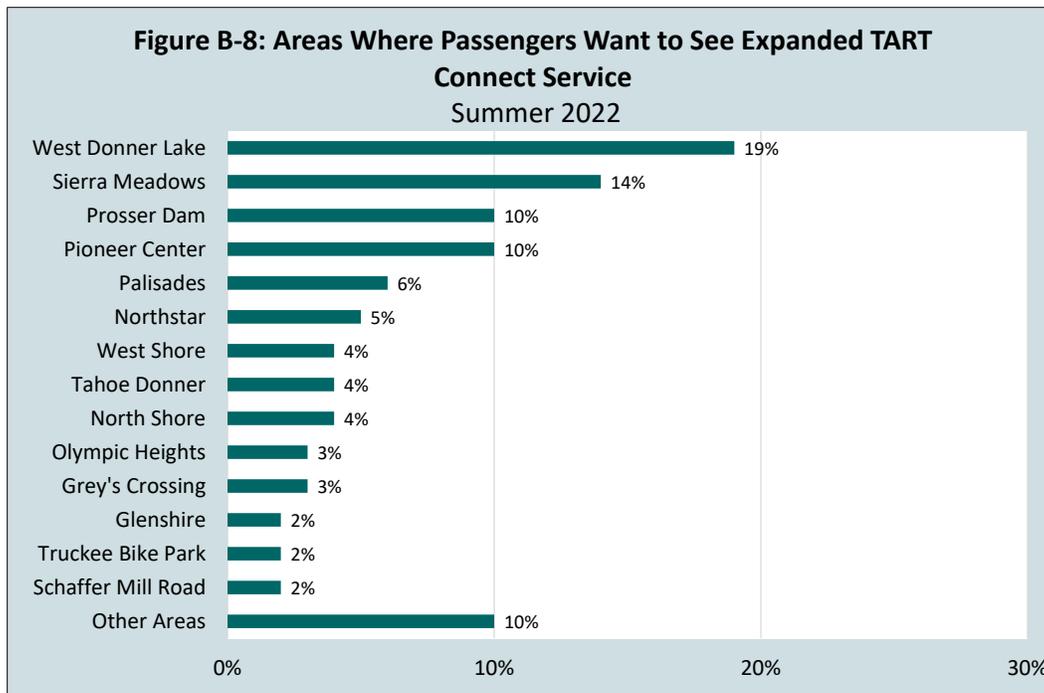
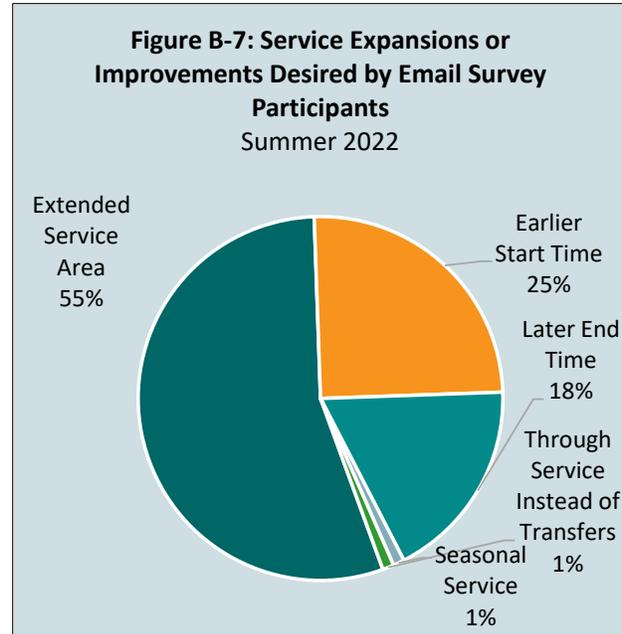


**Q7: Possible Service Expansions**

Question 7 of the survey asked if there were areas or times of day not currently being serviced that they would like to see added. More than half of the respondents indicated yes (51 percent), with the remainder saying no, as seen in Figure B-7.

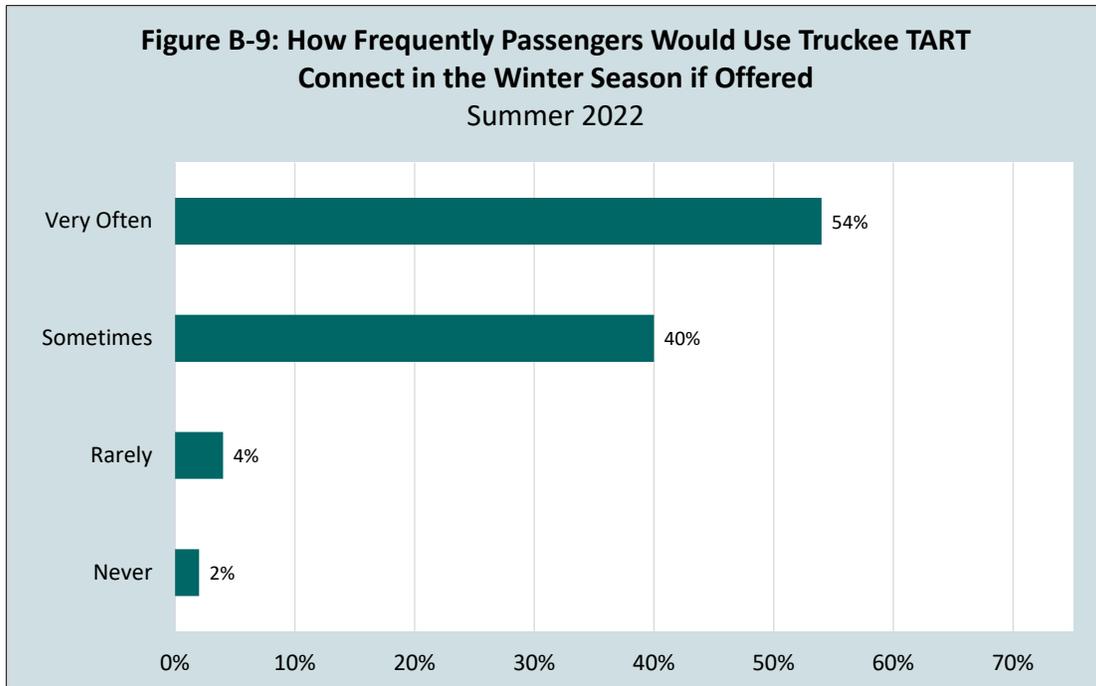
Of those that said yes, there are areas or times of day not currently being serviced by TART Connect Zones that they would like to see added, 55 percent of respondents indicated they wanted to see an extended service area. Those who wanted to see an earlier start time accounted for 25 percent and those who wanted to see a later end time accounted for 18 percent of respondents.

Further, those who would like to see an extended service area identified specific neighborhoods, listed in Figure B-8. West Donner Lake accounted for 19 percent of responses, followed by Sierra Meadows (14 percent). Prosser Dam and the Pioneer Center each accounted for 10 percent of respondents. Some of the other areas requested include Sawmill Height, West River Street, Armstrong Track, and Martis Camp.



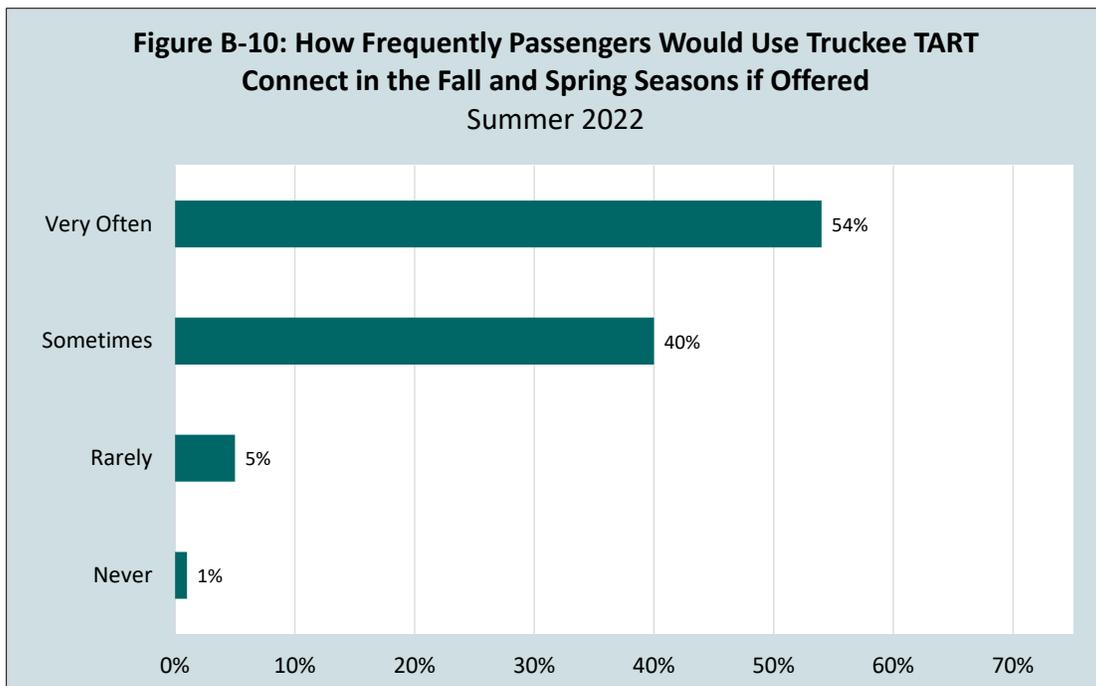
### **Q8: Potential Use of Winter TART Connect Service**

If a winter Truckee TART Connect service were offered, 54 percent of respondents indicated they would use the service very often. Approximately 40 percent would use it sometimes. Only 6 percent of respondents said they would rarely or never use the service.



**Q9: Potential Use of Fall and Spring TART Connect Service**

If fall and spring TART Connect service were offered, 55 percent of respondents indicated they would use the service very often. Approximately 40 percent would use it sometimes. Only 6 percent of respondents said they would rarely or never use the service.



## **Q10: Likelihood Passengers Would Recommend Truckee TART Connect to Others**

Over 90 percent of the email survey participants would be very likely to recommend the Truckee TART Connect microtransit service to a friend or colleague, indicating their likelihood to be a 10 out of 10.

Value	#		%
10	253		91%
9	16		6%
8	7		3%
7	2		1%
6	0		0%
5	0		0%
4	0		0%
3	0		0%
2	0		0%
1	0		0%

## **WINTER 2022-23**

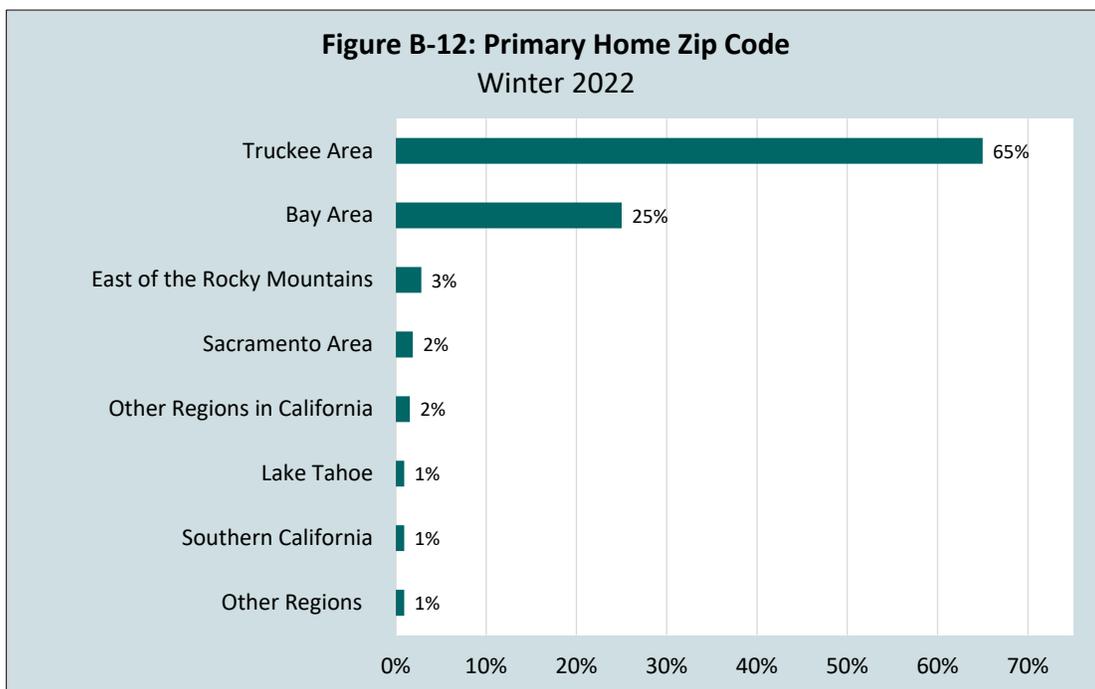
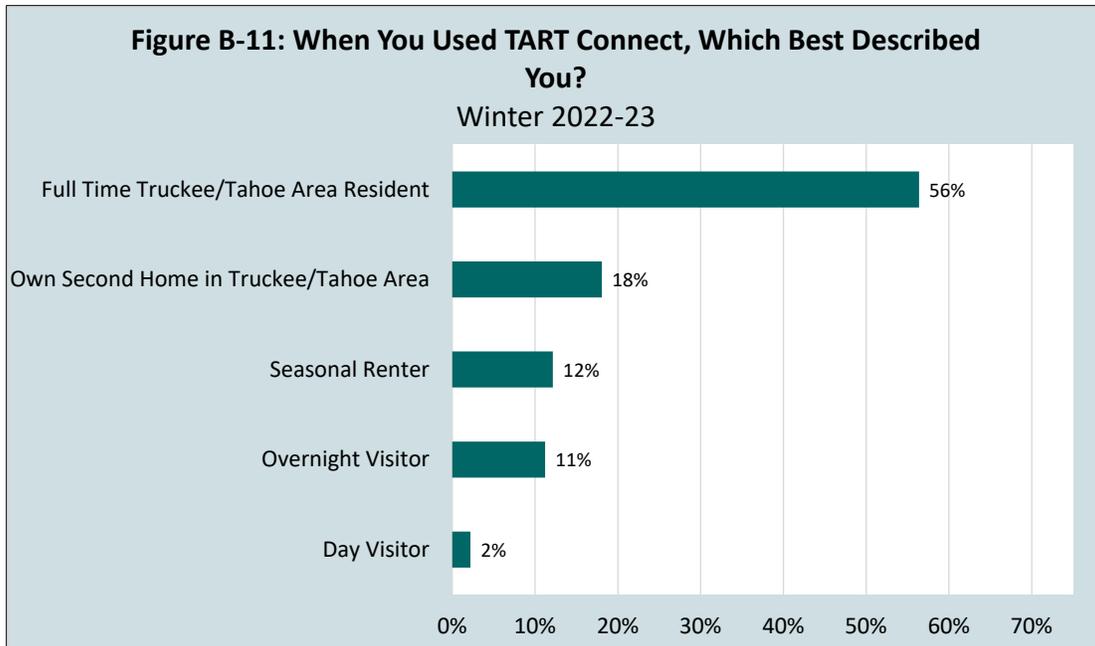
Downtown distributed another email survey during the winter 2022-23 season to passengers with registered app accounts. The survey largely consisted of the same questions as the summer survey, with a few exceptions. In all, 321 passengers participated. The winter 2022-23 survey results are detailed in this section as well as compared to the summer email survey results.

### **Q1: Resident or Visitor Type**

Of the winter email survey participants, 56 percent were full-time permanent Tahoe/Truckee residents, and 18 percent were people who own second homes in the area (Figure B-11). Winter seasonal renters represented 12 percent of the respondents. Compared to summer, a smaller proportion of the respondents were either full-time residents or second homeowners (-14 percent).

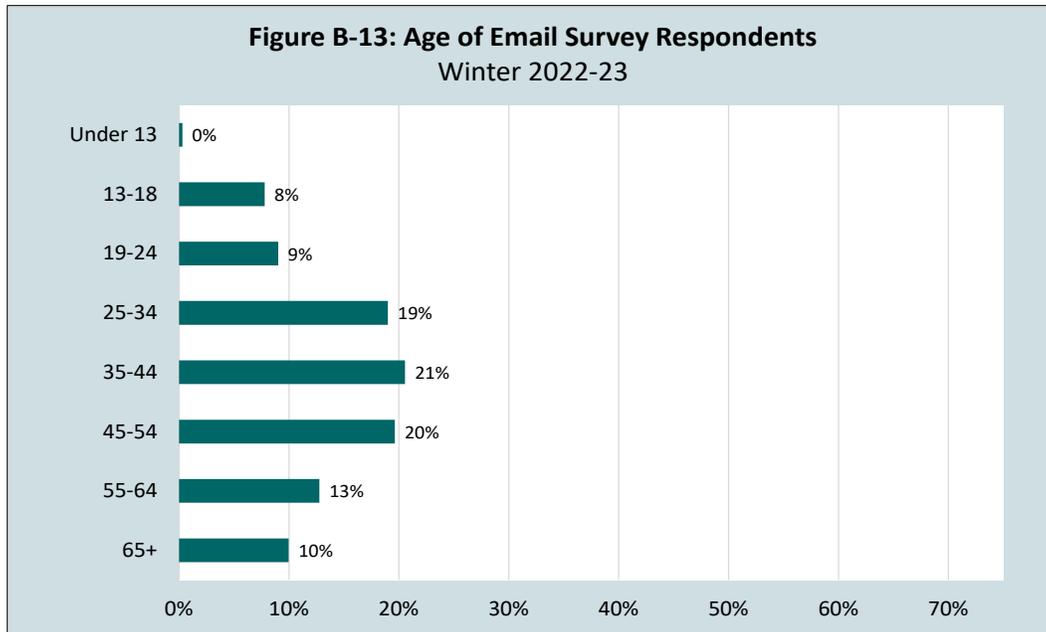
### **Q2: Home Zip Code**

Similar to the summer email survey, about two-thirds of the winter survey respondents reported that they were from the Truckee area (zip codes 96161 and 96160), as seen in Figure B-12. A greater proportion of the winter survey respondents were Bay Area residents compared to the summer email survey (25 percent, or +8 percent). Those with zip codes from the Bay Area accounted for 17 percent of respondents. Other places that the winter email survey respondents were visiting from included areas east of the Rocky Mountains (3 percent), the Sacramento area (2 percent), Lake Tahoe (1 percent), and other regions in northern and southern California (3 percent).



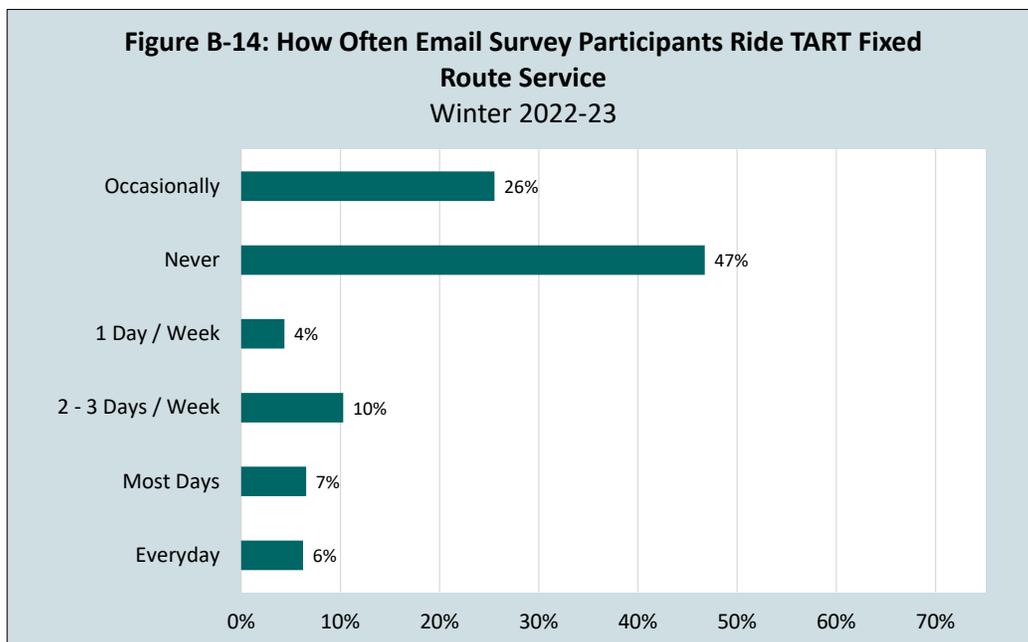
### Q3: Ages of Respondents

The winter email survey respondents were more representative of different age groups compared to the summer survey respondents: 21 percent were ages 35 to 44, 20 percent were ages 45 to 54, and 19 percent were ages 25 to 34 (Figure B-13). People 24 and younger represented 17 percent of the respondents, while people ages 65 and above made up only 10 percent of ridership.



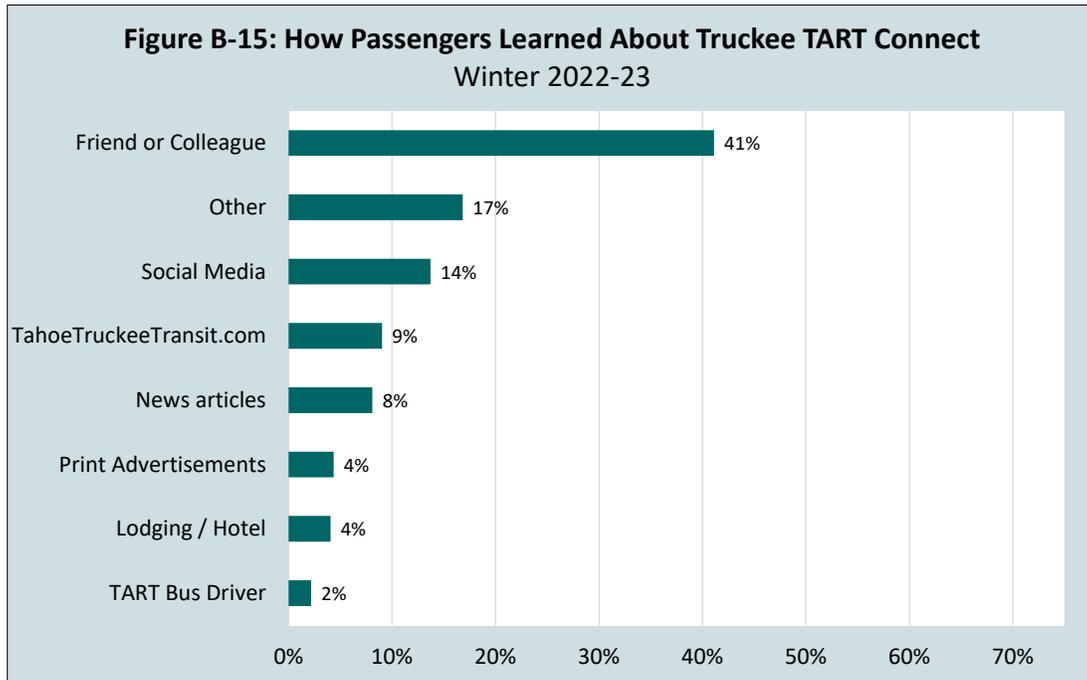
**Q4: TART Fixed Route Ridership Frequency**

6 percent of the winter email survey participants reported that they utilize TART fixed route bus service every day, and another 7 percent reported they ride the fixed route service most days. These two groups represent a slightly larger proportion of the total survey respondents compared to the summer email survey (+3 percent). On the other end of the spectrum, almost half of the respondents reported that they never used the TART fixed route service (47 percent), and about one quarter said they only use it occasionally (26 percent). Together, these groups represented 73 percent of the total respondents, identical to the summer email survey. This data is summarized in Figure B-14.



## Q5: How Passengers Heard About Truckee TART Connect Service

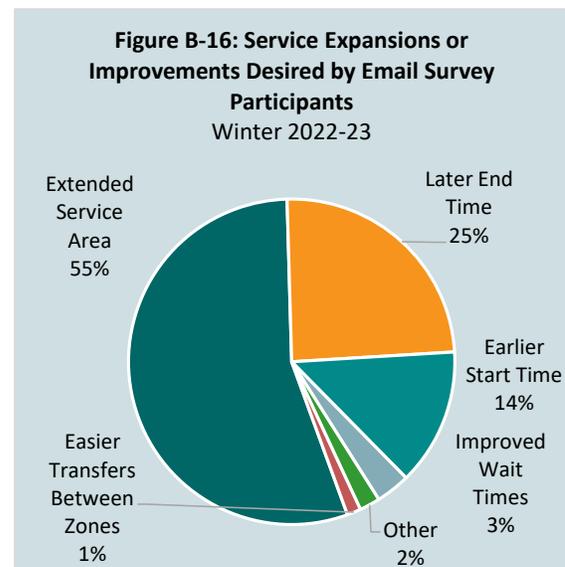
The most common ways that the winter survey respondents had heard about Truckee TART Connect was from friends or colleagues (41 percent), social media (14 percent), and the Truckee TART official website (9 percent) (Figure B-15). These values are similar to the summer survey, when 42 percent reported that they learned about Truckee TART Connect from friends or colleagues and 21 percent from social media.



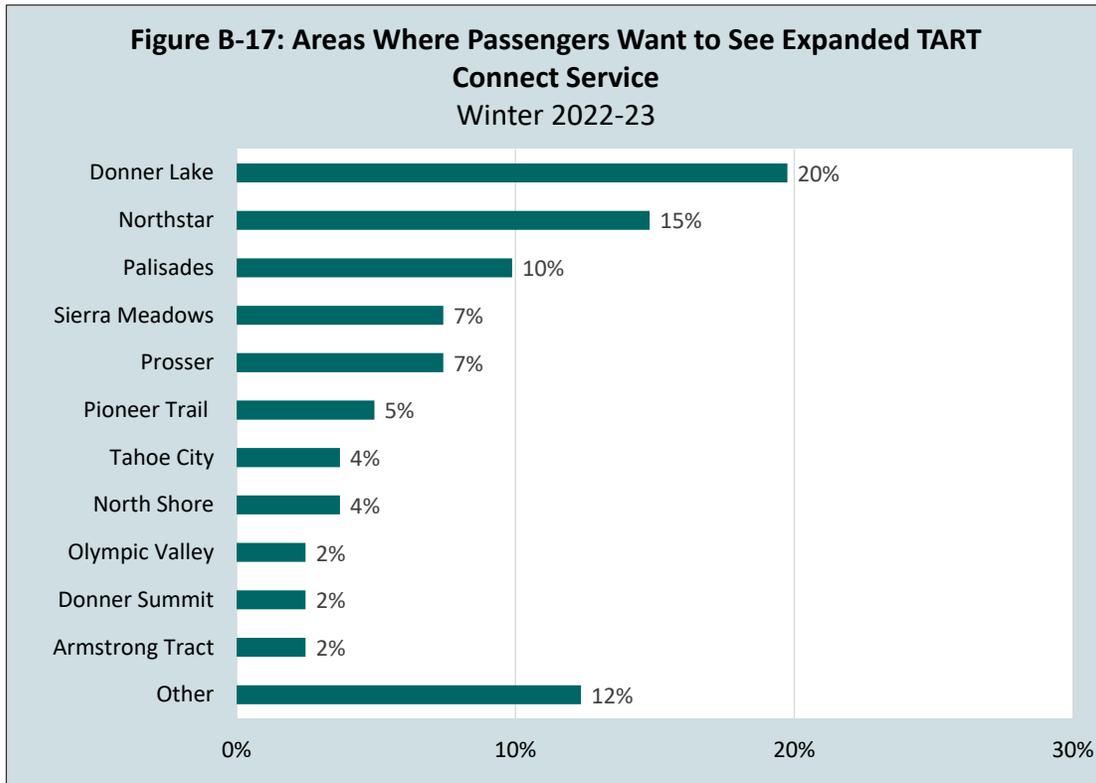
## Q6: Possible Service Expansions

Similar to the summer survey, the winter email survey also included a question asking if there were areas or times of day not currently being serviced the respondents would like to see added. 46 percent answered yes, and 54 percent answered no.

Of those that reported they wished the Truckee TART Connect service would be expanded or improved, 55 percent said they would like the service area expanded (identical to the summer email survey). 25 percent requested later hours, primarily so they could use the Truckee TART Connect service to get home from downtown bars. 14 percent requested earlier hours, primarily so they could get to their place of work. A few participants mentioned that they were hindered from using the service due to the long wait times and suggested hiring additional drivers (3 percent).



Many of the respondents who suggested that the service area be expanded listed specific neighborhoods that they would like served, listed in Figure B-17. The top area suggested for additional Truckee TART Connect service was Donner Lake (20 percent), Sierra Meadows (7 percent), and Prosser (7 percent). There were a number of requests to include nearby ski resorts such as Northstar and Palisades in the service area. A few of those who requested the service area be expanded to include local resorts also mentioned Truckee TART consider a fixed route alternative.



### **Q7: Likelihood Passengers Would Recommend Truckee TART Connect to Others**

The vast majority of the winter email survey respondents ranked the likelihood that they would recommend the Truckee TART connect service to others a 9 or 10 out of 10, as detailed in Table B-2. However, 5 percent ranked their likelihood of recommending the service to others a 0 to 6 out of 10. This was a significant jump compared to the summer survey, when no one suggested they would be unlikely to recommend Truckee TART Connect.

**Table B-2: Likelihood Passengers Would Recommend Truckee TART Connect to Friends or Colleagues**

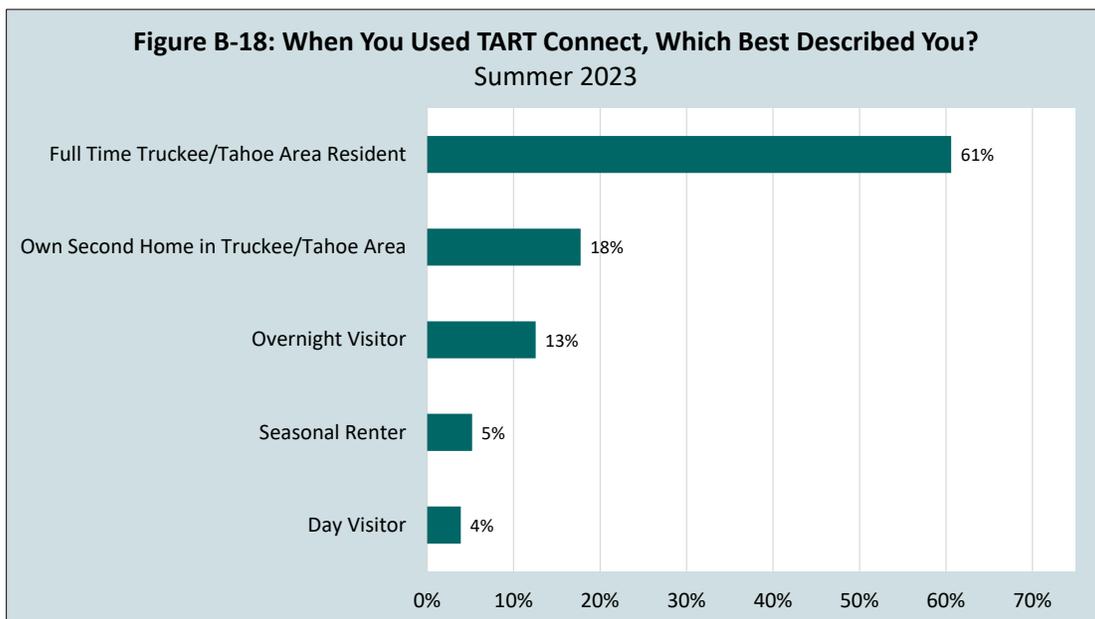
Value	#	%
9 - 10	252	79%
7 - 8	50	16%
0 - 6	17	5%

## SUMMER 2023

During the summer 2023 season, Downtowner distributed another email survey with the same questions as the winter 2022-23 survey. Throughout the season, 231 passengers responded to the email survey. This section discusses the summer 2022-23 email survey results and compares the results to the previous two efforts as well.

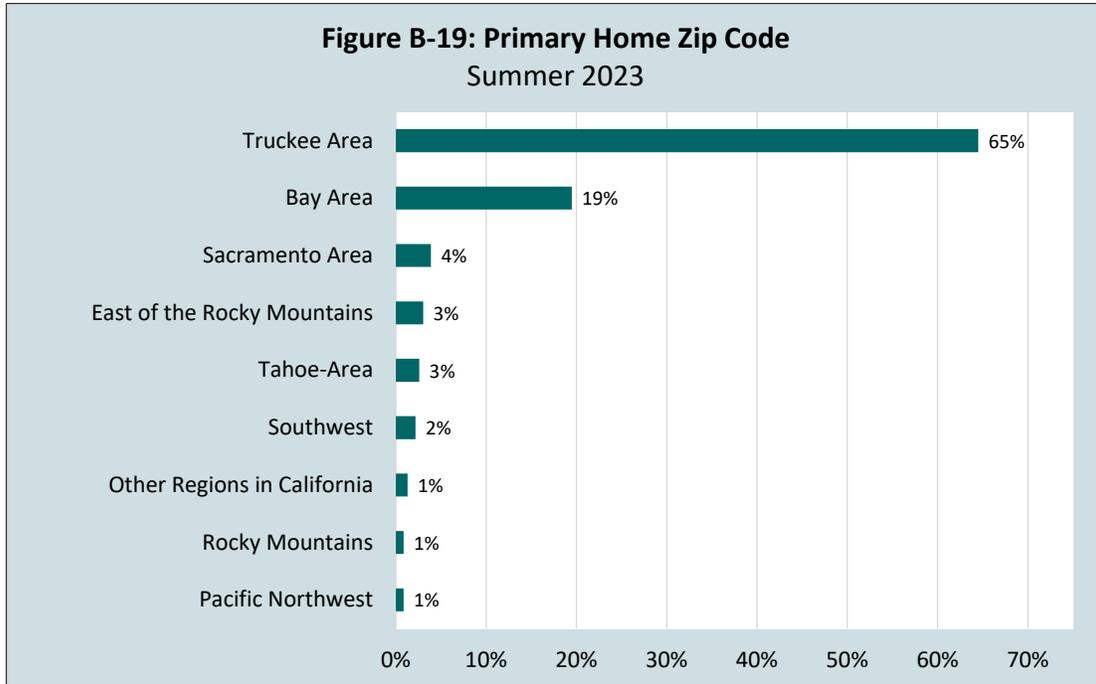
### Q1: Resident or Visitor Type

Figure B-18 shows how the majority of the summer 2023 email survey respondents were full-time Tahoe/Truckee residents (61 percent). About 18 percent reported they were second homeowners, identical to the winter email survey. Overall, full-time residents and second homeowners represented 79 percent of all respondents, a 5 percent increase compared to the winter 2022-23 email survey, but 9 percent less compared to the previous summer's email survey. Additionally, 13 percent of the respondents were overnight visitors, 5 percent were seasonal renters, and 4 percent were day visitors.



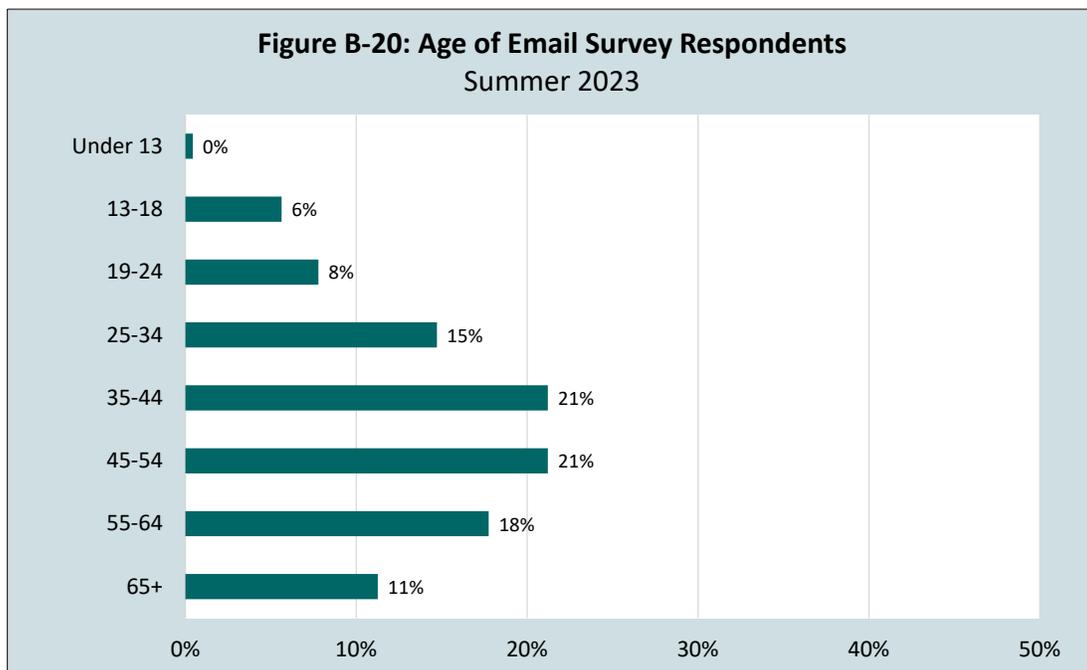
### Q2: Home Zip Code

Similar to both of the previous email survey efforts, about two-thirds of the summer 2023 survey respondents reported that they were from the Truckee area (zip codes 96161 and 96160). About one-fifth (19 percent) of the respondents were from the Bay Area, which was similar to the previous summer email survey (+2 percent) and slightly less compared to the winter email survey (-6 percent). Other areas where the summer 2023 email respondents were visiting from included the Sacramento area (4 percent), southern California (3 percent), and areas east of the Rocky Mountains (3 percent), among others. This data is summarized in Figure B-19.



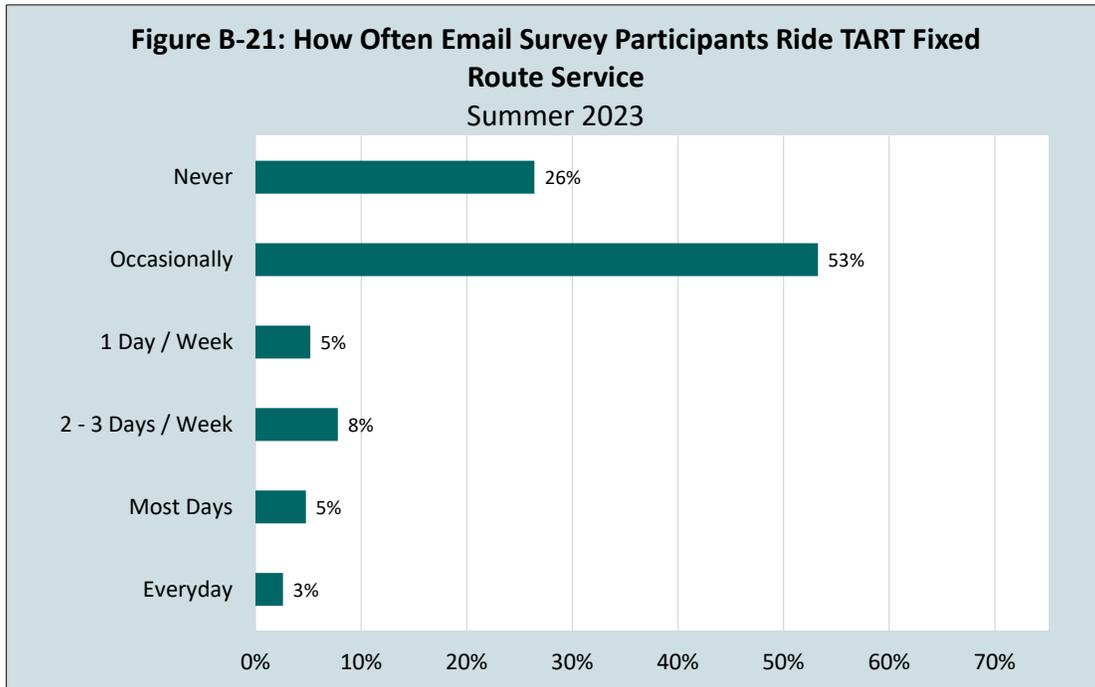
**Q3: Ages of Respondents**

The summer 2023 email survey respondents were of similar age to the winter respondents: 21 percent were also ages 35 to 44, 21 percent were ages 45 to 54 (+1 percent compared to the winter survey), and 18 percent were ages 55 to 64. People 24 and younger represented 14 percent of the respondents (-3 percent compared to the winter survey), while people ages 65 and above comprised 11 percent of ridership (+1 percent compared to the winter survey). This data is summarized in Figure B-20.



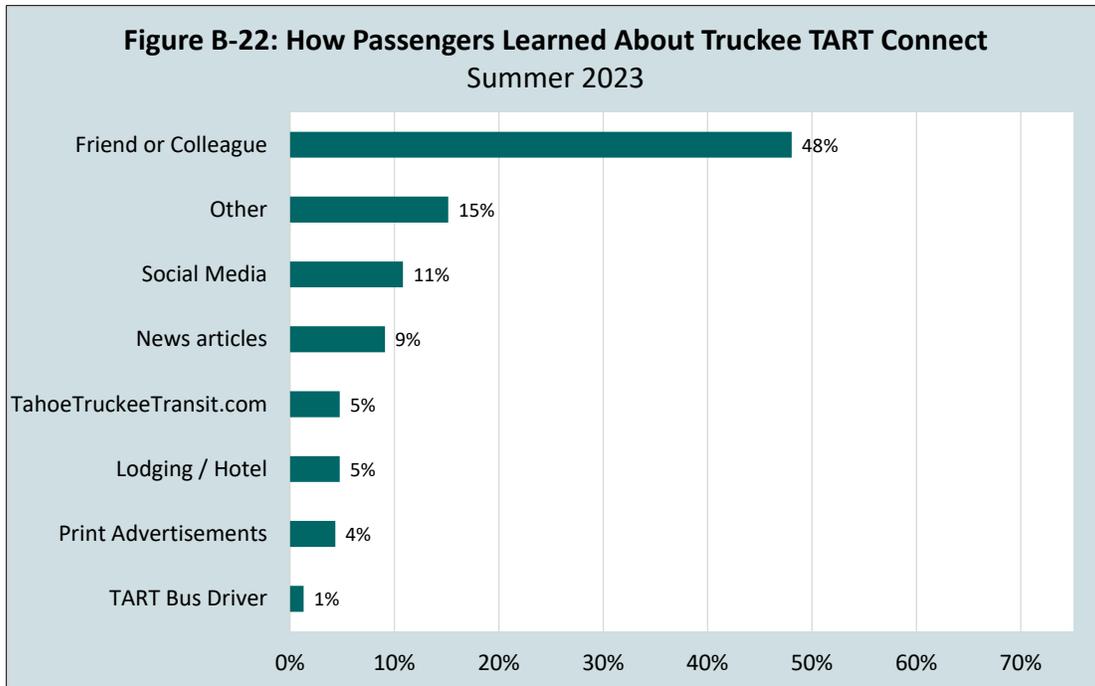
#### **Q4: TART Fixed Route Ridership Frequency**

Only 8 percent of the summer 2023 email survey participants ride TART fixed routes either everyday or most days. Based on this data, the proportion of the summer 2023 email survey respondents who ride TART fixed routes frequently was smaller compared to both the summer 2022 and winter 2022-23 surveys (-2 and -5 percent, comparatively). Infrequent TART fixed route riders, or those who reported that they never either never ride TART fixed routes or only ride occasionally, represented 79 percent the total respondents, a 6 percent increase compared to the two previous email survey efforts.



#### **Q5: How Passengers Heard About Truckee TART Connect Service**

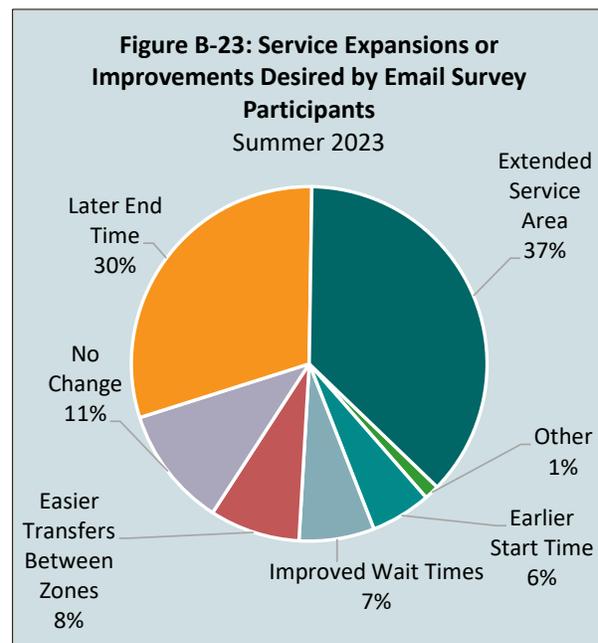
Almost half of the summer 2023 email survey respondents heard about the Truckee TART Connect from a friend or colleague (48 percent) (Figure B-22). Other ways the respondents reported that they learned about the microtransit service was from social media (11 percent), news articles (9 percent), and the Truckee TART official website (5 percent). These results are similar to the previous two email surveys in that most of the respondents reported learning about the Truckee TART Connect from friends or colleagues, however the proportion of respondents who learned about the service from social media continued to steadily decline; 21 percent of the summer 2022 survey respondents and 14 percent of the winter 2022-23 survey respondents heard about the Truckee TART Connect via social media.



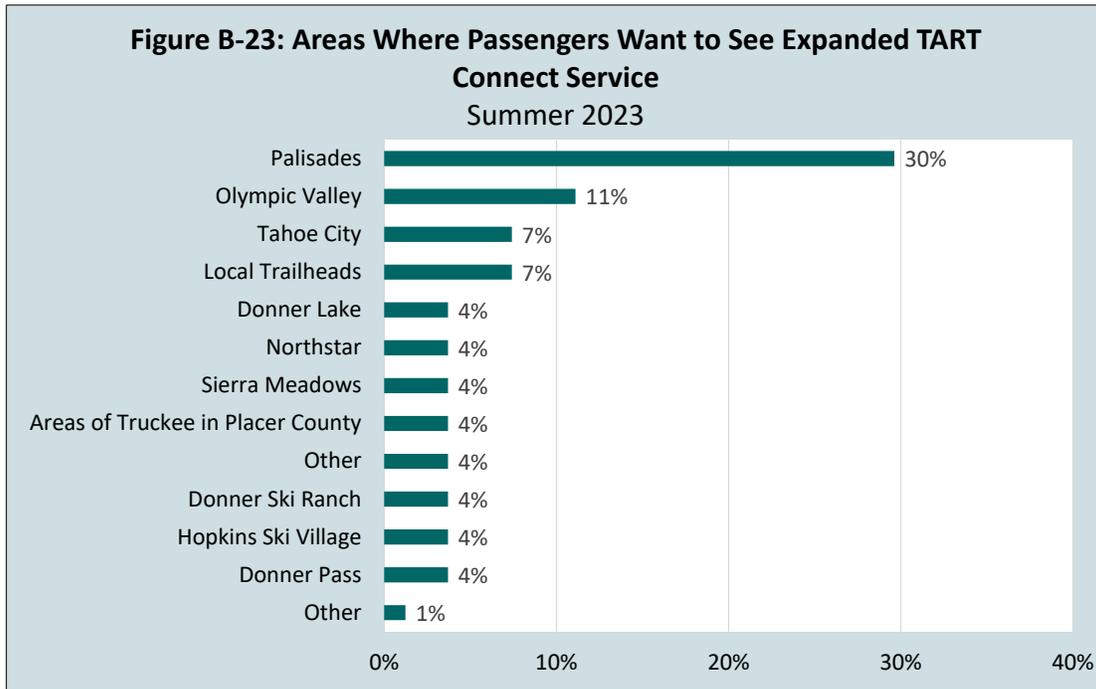
### Q6: Possible Service Expansions

Respondents were asked if there are areas or times of day not currently being serviced by the Truckee TART Connect that the respondents would like to see served. 30 percent answered yes, and 70 percent answered no. Compared to the other two email surveys, this was the smallest proportion of respondents who asked for a service improvement, suggesting that the service modifications implemented since the initial pilot have largely addressed passenger requests.

Of those that asked for service expansions or improvements, 37 percent said they would like the service area expanded (-18 percent compared to the previous two email surveys). More respondents requested later hours (30 percent, or +12 percent from the summer 2022 survey and +5 percent from the winter 2022-23 survey), with the most common reason cited being so that more people could use microtransit to get home from downtown bars. Only 6 percent requested earlier hours. A greater proportion of the summer 2023 email survey participants (7 percent) asked for improved wait times compared to the other two surveys.



Of the respondents who requested Truckee TART Connect serve additional areas, the top requested locations were Palisades (30 percent), Olympic Valley (11 percent), Tahoe City (7 percent), and local trailheads. Unfortunately, serving any of these locations would significantly hinder productivity and cost efficiency; these locations would be more appropriately served by fixed routes. A few respondents requested that Truckee TART Connect serve neighborhoods adjacent to Truckee that fall outside of town limits (4 percent). This data is also presented in Figure B-23.



**Q7: Likelihood Passengers Would Recommend Truckee TART Connect to Others**

Similar to the other two surveys, the large majority of the summer 2023 email survey respondents ranked the likelihood that they would recommend the Truckee TART connect service to others a 9 or 10 out of 10 (86 percent). 5 percent ranked their likelihood of recommending the service to others a 0 to 6 out of 10, identical to the winter 2022-23 survey.

**Table B-3: Likelihood Passengers Would Recommend Truckee TART Connect to Friends or Colleagues**

Value	#	%
9 - 10	196	86%
7 - 8	22	10%
0 - 6	11	5%

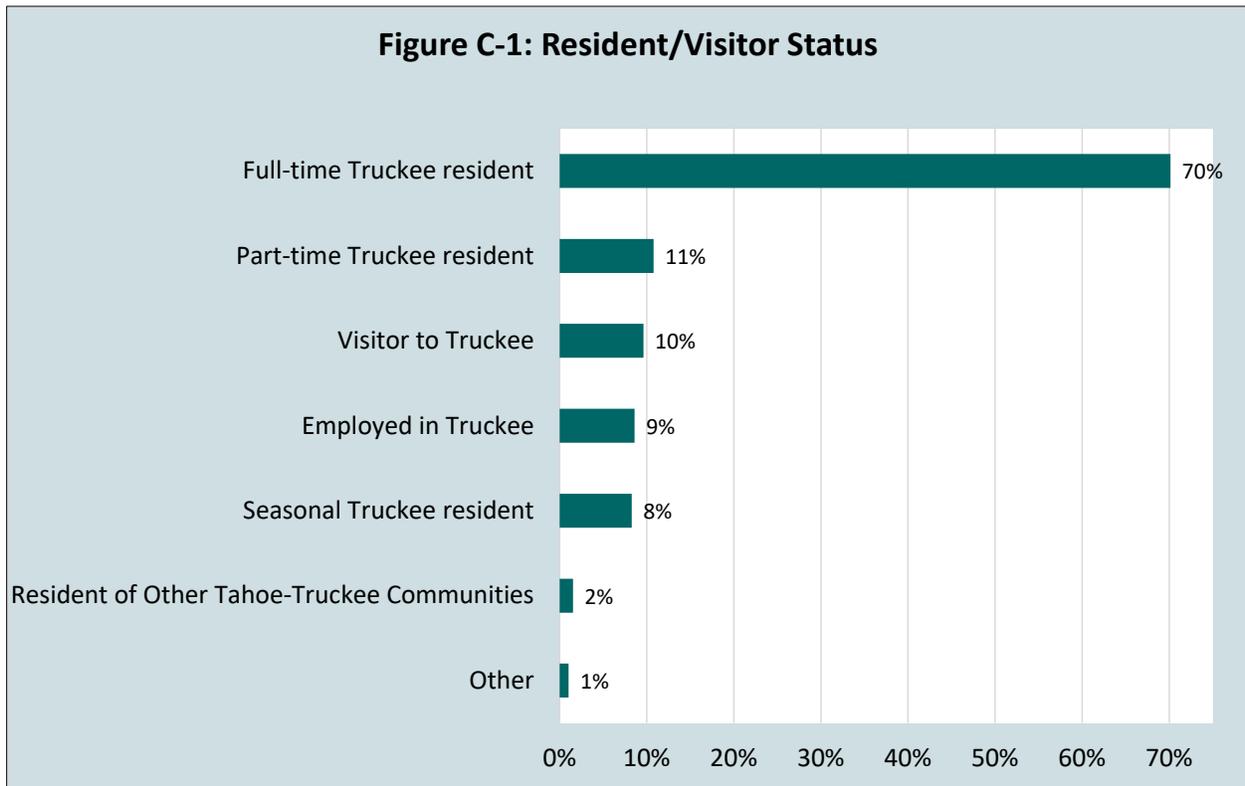
**GENERAL COMMUNITY SURVEY RESULTS**

**INTRODUCTION**

LSC conducted a general community survey regarding the Truckee TART Connect service during November and December 2023. The survey was designed to gather input on how the Truckee TART Connect is used and perceived by residents, local employees, and visitors alike. In all, 593 people participated, 566 of whom completed the survey in English and 27 of whom completed the survey in Spanish. This Appendix reviews the Truckee TART Connect general community survey results, comparing the results to previous survey efforts when pertinent.

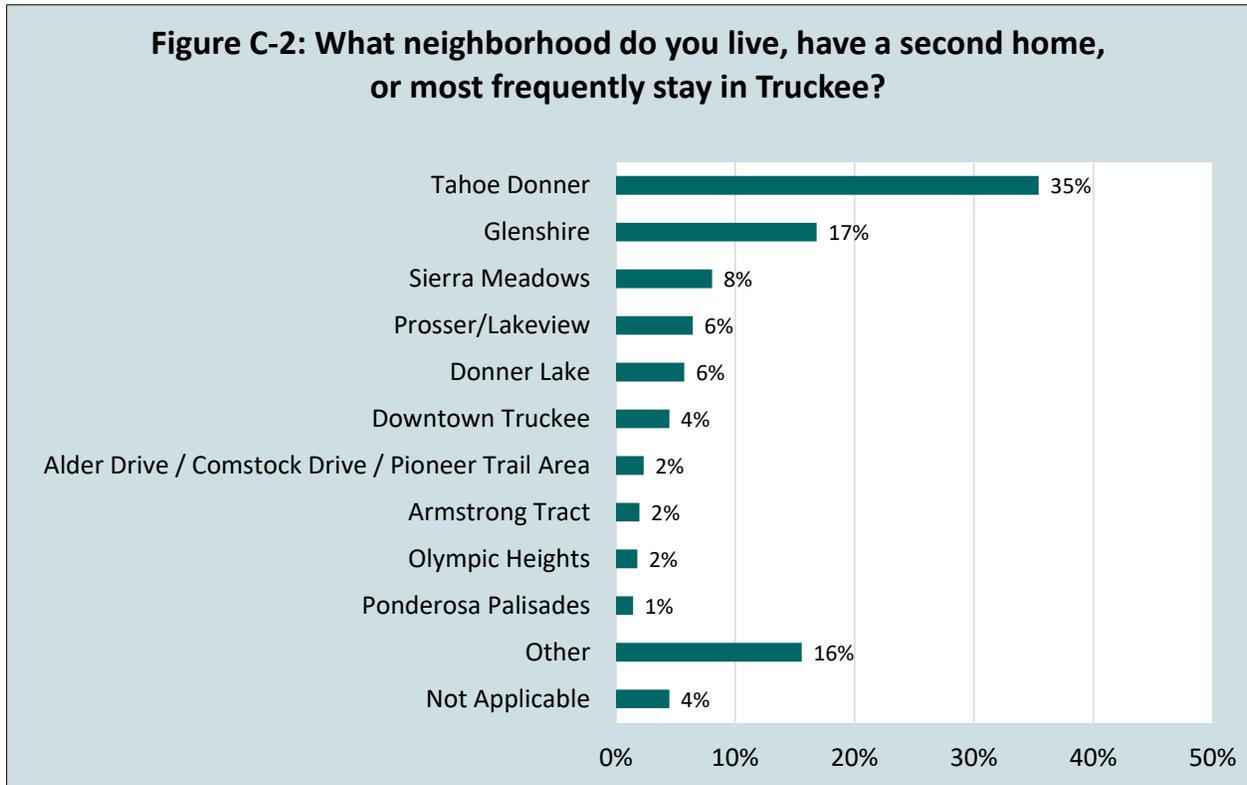
**Q1: Resident or Visitor Type**

The majority of the survey respondents were full-time Truckee residents (70 percent) (Figure C-1). This was followed by 11 percent who were part-time Truckee residents, 10 percent who were visitors to Truckee, and 9 percent who were employed in Truckee. A small proportion of respondents indicated they live in other communities within the Tahoe-Truckee region (2 percent).



## **Q2: Place of Residence within Truckee**

The survey respondents were asked which neighborhood or area of Truckee they either live in or primarily stay in when visiting, as shown in Figure C-2. The most popular neighborhoods were Tahoe Donner (35 percent), Glenshire (17 percent), and Sierra Meadows (8 percent). Of the 16 percent who answered “Other,” most live in other North Lake Tahoe communities or near Northstar resort.



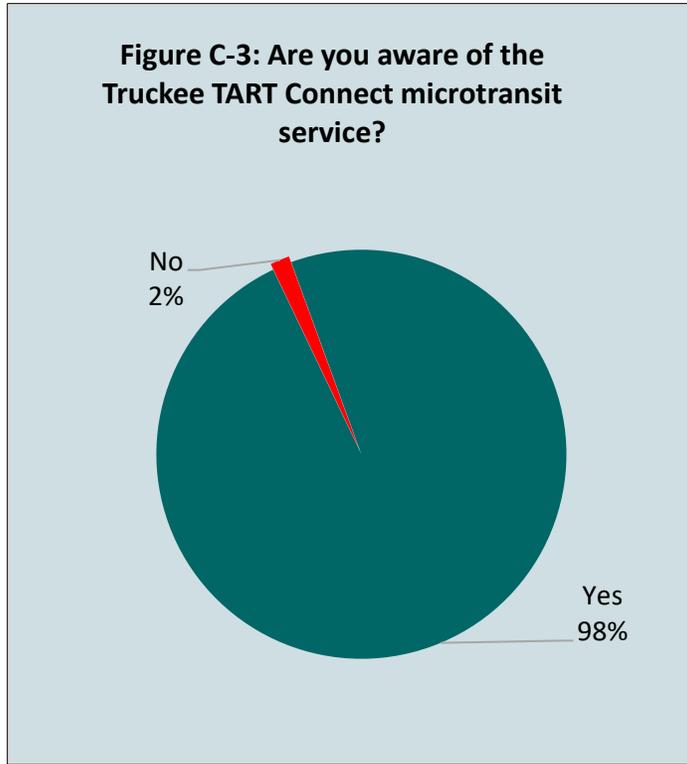
## **Q3: Awareness of Truckee TART Connect Service**

Almost all (98 percent) of the survey participants were aware of Truckee TART Connect (Figure C-3). This represented an 8 percent increase compared to the general community survey done in 2022 and summarized in the *Truckee Microtransit Study (2023)*.

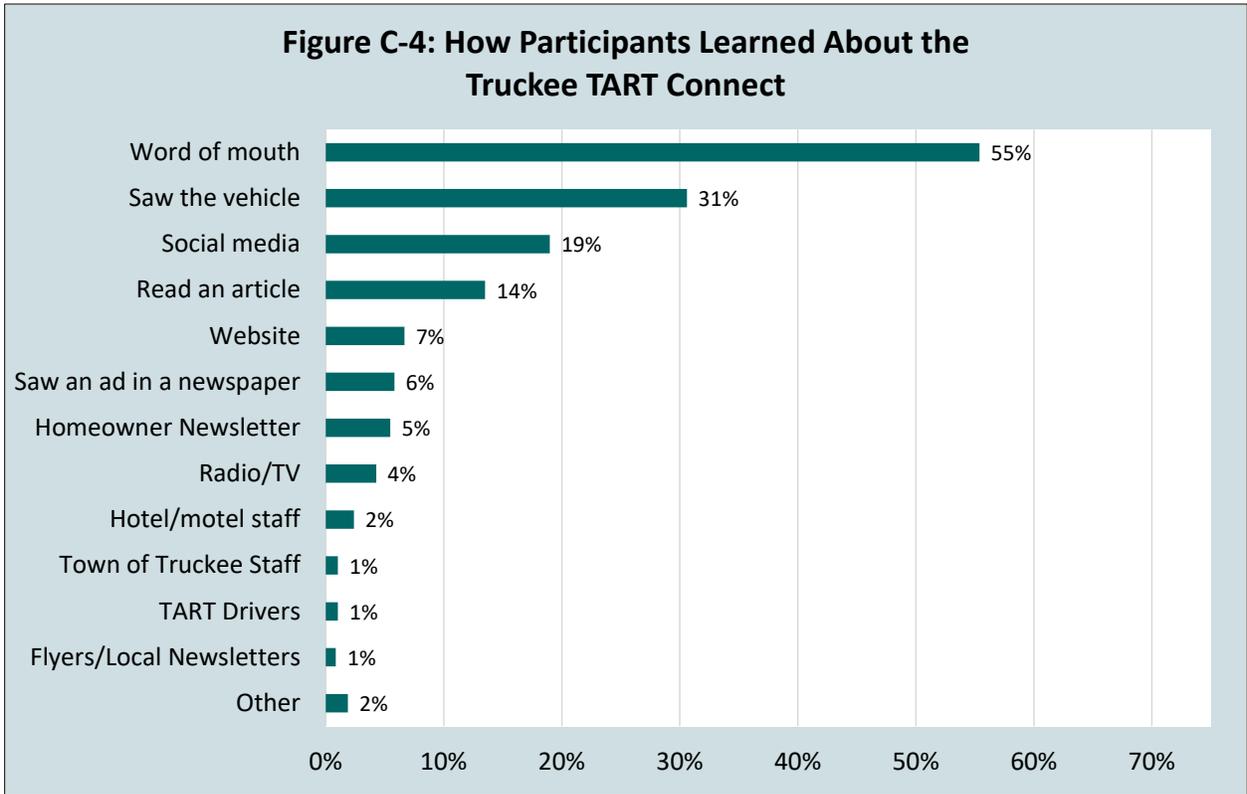
## **Q4: How Residents Heard of the Truckee TART Connect Service**

A considerable proportion of the respondents reported that they learned about the Truckee TART Connect by either word of mouth or social media (74 percent). Additionally, about one-third of the respondents learned about the service simply by seeing a vehicle (31 percent) (Figure C-4). Many people also learned about the service through various forms of media such as websites, articles, and newspaper advertisements.

**Figure C-3: Are you aware of the Truckee TART Connect microtransit service?**



**Figure C-4: How Participants Learned About the Truckee TART Connect**

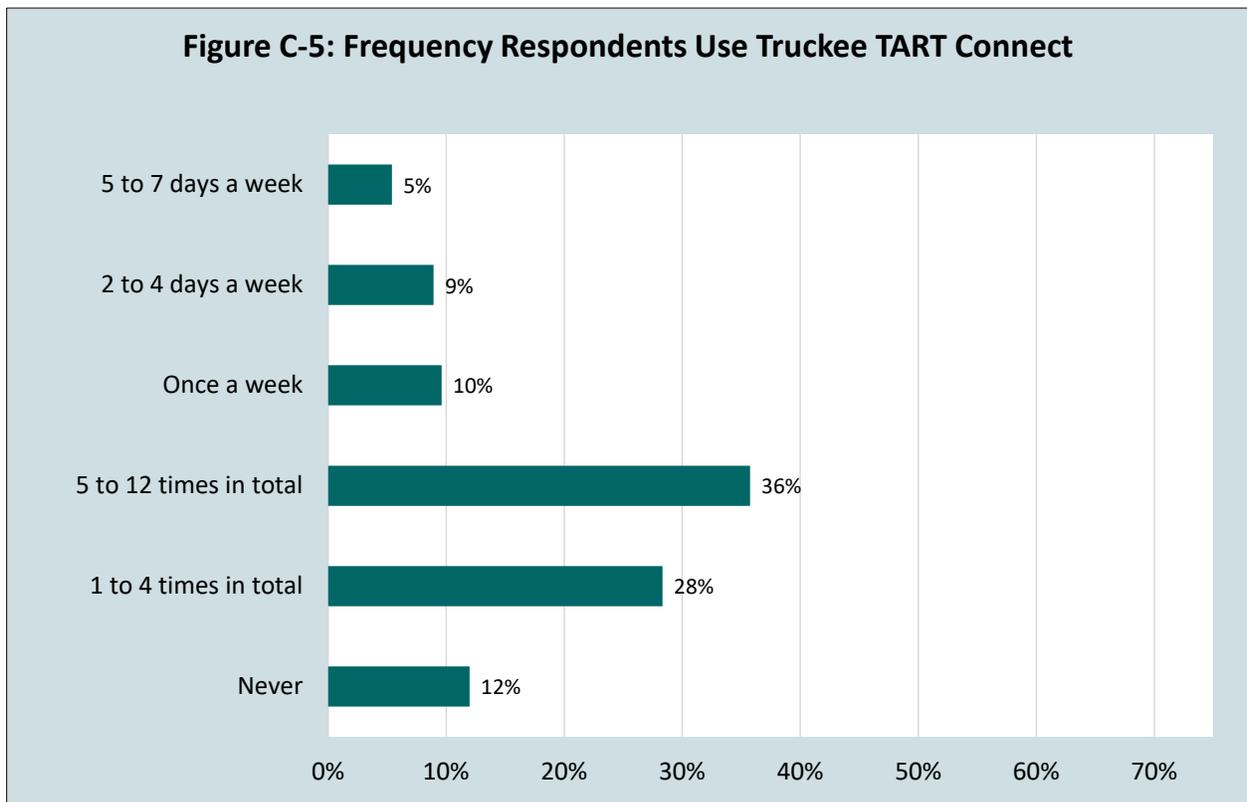


### **Q5: Frequency Respondents Use Truckee TART Connect**

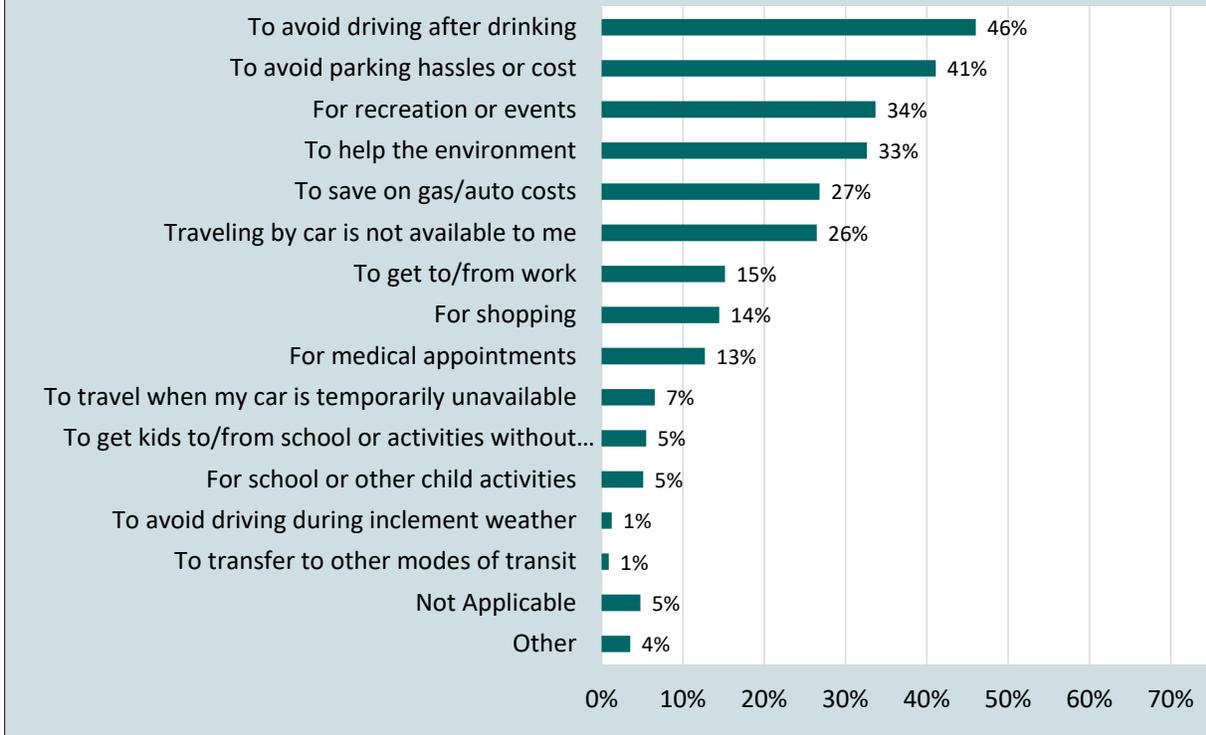
Figure C-5 shows how most of the survey respondents ride the Truckee TART Connect service infrequently; 76 percent of the respondents rode 12 times or less from June 2022 through December 2023. Of the 24 percent who are regular riders, 5 percent ride 5 to 7 days a week, 9 percent ride 2 to 4 days a week, and 10 percent ride once a week.

### **Q6: Reasons Participants Use Truckee TART Connect**

The top reasons why the survey respondents reported they ride Truckee TART Connect are to avoid driving after drinking (46 percent), to avoid parking hassles and costs (41 percent), to get to recreation and events (34 percent), and to help the environment (33 percent). 26 percent use the Truckee TART Connect because they cannot drive, whether due to a medical condition or not having a vehicle available. Another 7 percent use the microtransit service when they are temporarily unable to drive due to either someone else using their vehicle or their vehicle needing to undergo maintenance. The data regarding the survey respondents use the Truckee TART Connect is presented in Figure C-6.



**Figure C-6: Why Respondents Use Truckee TART Connect**



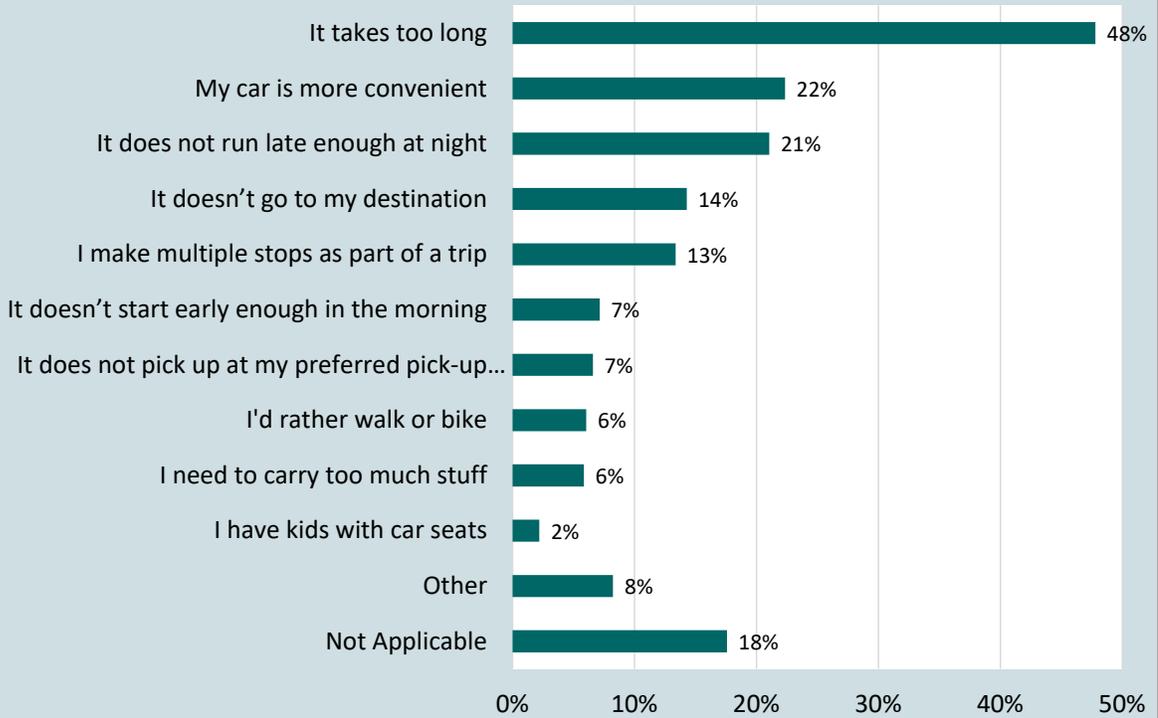
### **Q7: Reasons Participants Do Not Use the Truckee TART Connect**

The most common issue inhibiting the survey respondents from riding Truckee TART Connect is the long wait times (48 percent). About one quarter (22 percent) of the participants cited that they do not ride the microtransit service because their car is more convenient, and 21 percent said the Truckee TART Connect does not run late enough to meet their needs. The full list of reasons are presented in Figure C-7.

### **Q8: Likelihood Respondents Would Recommend Service to Others**

68 percent of the community survey respondents rated the likelihood that they would recommend the Truckee TART Connect to others a 10 out of 10 (Table C-1). This rate was almost identical to the community survey conducted for the *Truckee Microtransit Study (2023)*, in which 67 percent of the respondents ranked their likelihood of recommending the service to others a 10 out of 10. A greater proportion of the survey respondents indicated a positive score of 7 or above when assessing the likelihood they would recommend the Truckee TART Connect to others compared to the previous year (91 percent versus 77 percent in 2022). These results indicate continued, and even growing, community support for the microtransit program.

**Figure C-7: Why Respondents *Do Not Use* Truckee TART Connect  
Winter 2023**



**Table C-1: On a scale of 0 to 10 how likely are you to recommend Truckee TART connect to a friend or colleague?**

Value	#	%
1	9	1.5%
2	7	1.2%
3	3	0.5%
4	6	1.0%
5	14	2.4%
6	11	1.9%
7	32	5.5%
8	55	9.4%
9	47	8.1%
10	399	68.4%

## **Q9: Support for Operating the Truckee TART Connect in the Different Seasons**

The majority of the survey respondents support providing the Truckee TART Connect service year-round, as shown in Table C-7. The survey participants showed slightly more support for winter and summer service (85-86 percent indicated a 9 or 10) compared to providing service in the off-peak seasons (80 percent indicated a 9 or 10).

**Table C-2: On a scale of 1 (strongly do not support) to 5 (strongly support), how supportive are you of future service in the following seasons:**

	1	2	3	4	5	6	7	8	9	10	Average Score
Summer (June through Early September)	2%	0%	1%	0%	2%	2%	3%	4%	7%	79%	<b>9.3</b>
Winter (Mid-December through Early April)	2%	0%	0%	1%	3%	1%	2%	5%	6%	79%	<b>9.3</b>
Spring/Fall	2%	1%	1%	1%	4%	2%	3%	6%	6%	74%	<b>9.0</b>

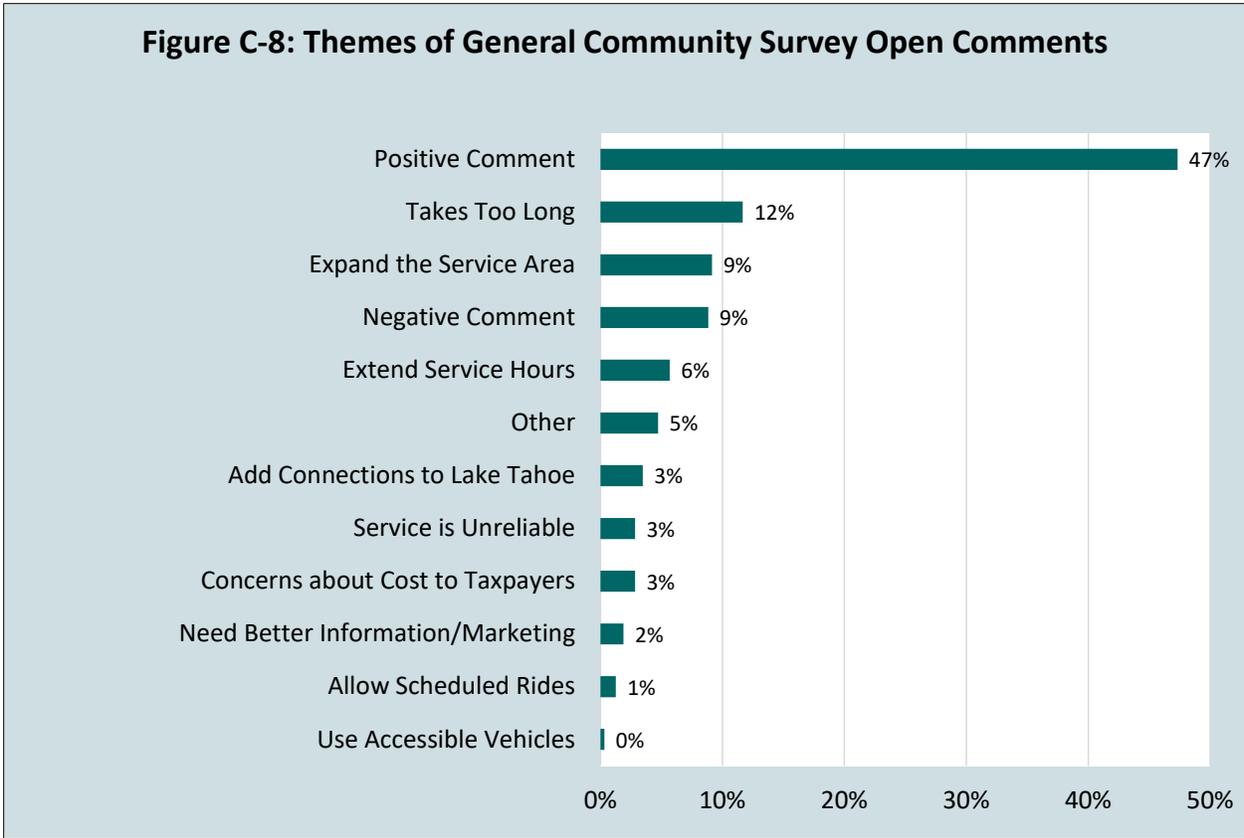
## **Q10: Additional Comments**

The survey respondents were provided with the opportunity to provide any additional comments they have regarding the Truckee TART Connect. Figure C-8 summarizes the key themes evident in the open-ended comments, with the full list of comments provided on pages C-14 to C-23 in this Appendix. As shown, about half of the comments were positive compliments for the program (47 percent). Regarding potential service improvements, the most common request was for wait times to be shortened (12 percent), with many suggesting that Truckee TART Connect hire additional drivers or allow for pre-scheduled rides. 9 percent requested for the service area to be expanded. These consisted of 8 requests for services just south of Truckee in Martis Valley (including the Placer County portion of Sierra Meadows), 7 requests for service to Northstar, 8 to Donner Summit/Sugar Bowl, and 3 to Olympic Valley.

Only 6 percent of respondents asked for extended service hours, but most of these requests were for later service. Unfortunately, 9 percent of respondents left a negative comment regarding service quality or driver decorum. Additionally, 3 percent stated they were unable to use Truckee TART Connect because it is unreliable. These comments should be used to develop potential service improvements related to ride scheduling and driver training.

## **Additional Questions**

The Truckee TART Connect general community survey included additional questions intended to gather information on the community's awareness of other micromobility programs in Truckee, such as the BCycle program, as well as the survey respondents' demographics. The responses to these additional questions are reviewed briefly below.



**Q11: Awareness of Town’s BCycle Bike Share Program**

While the majority of the survey respondents were aware of the Town of Truckee’s BCycle bike share program (67 percent), only 9 percent of the respondents have actually used the service, as indicated in Figure C-9. One-third of the respondents were unaware of the program.

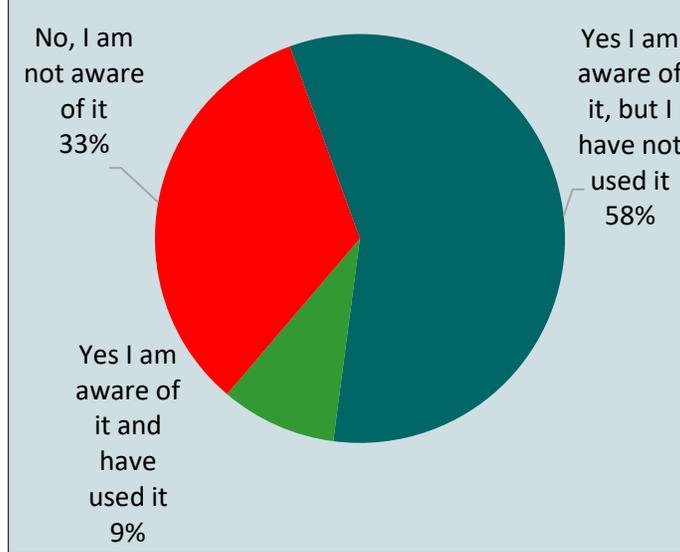
**Q12: Reasons Participants Do Not Use the BCycle Bike Share**

Most of the survey respondents have not utilized the BCycle bike share program either because they have not had an opportunity (31 percent), or they do not know enough about how to ride (21 percent). A sizable proportion of the survey respondents reported that they own their own e-bike or bicycle, and therefore have no need for the bike share program. A number of people indicated that they believe the program is more appropriate for tourists based on the station locations and pricing structure. The full list of reasons why the participants have not used the BCycle bike share is presented in Figure C-10.

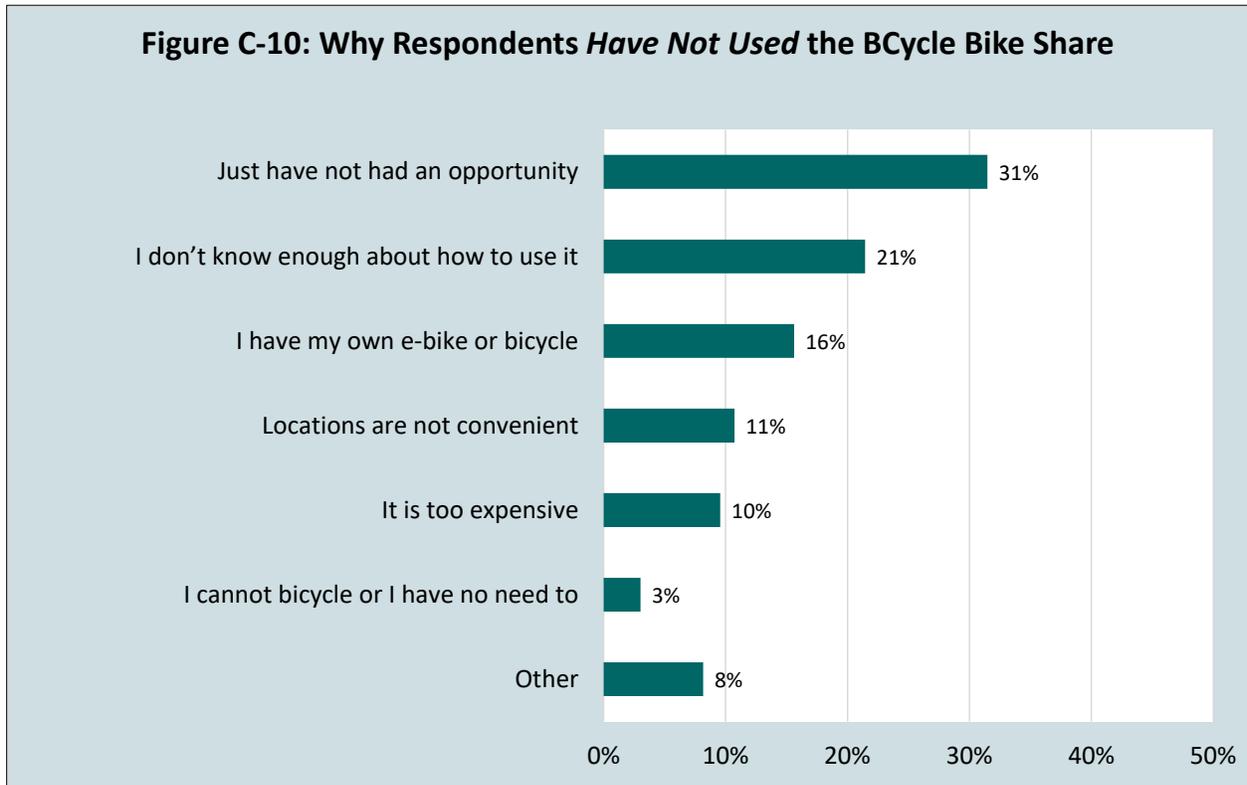
**Q13: Gender**

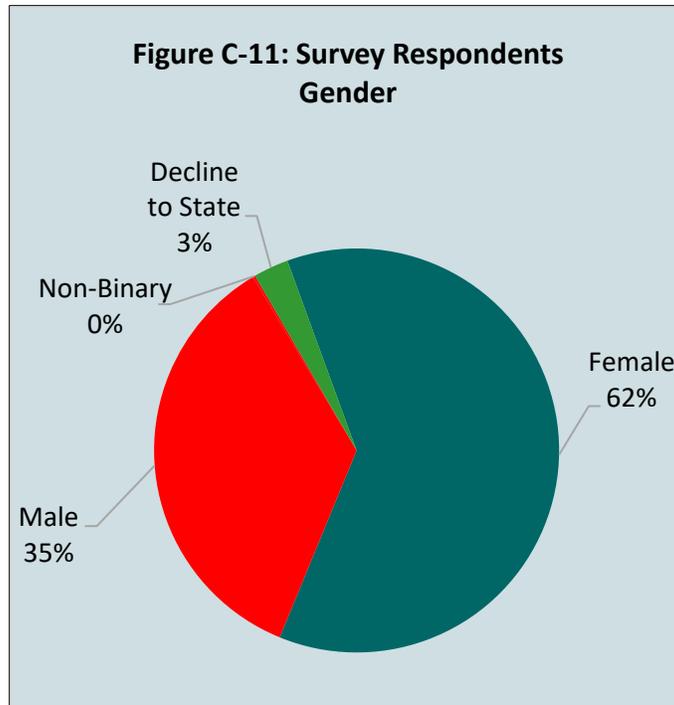
Most of the respondents to the general community survey were female (62 percent), while just over one-third of the respondents were male (35 percent), as shown in Figure C-11. This gender distribution is not reflective of the actual Town of Truckee population; according to the American Community Survey (ACS) 2022 5-Year Estimates, only 49 percent of Truckee residents are female.

**Figure C-9: Are you aware of the Town's BCycle bike share program?**



**Figure C-10: Why Respondents *Have Not Used* the BCycle Bike Share**





**Q14: Age**

Over 60 percent of the respondents were adults ages 35 to 64 (61 percent) (Figure C-12). About one-quarter of the respondents were adults ages 18 to 34 (23 percent). Few participants were either youth aged 17 or younger (4 percent) or adults aged 65 or older (12 percent). Middle-aged adults represented a greater proportion of the survey respondents than they do in the the actual Truckee population; per the ACS, 22 percent of Truckee residents are youth younger than 18 years old and 17 percent are adults 65 and older.

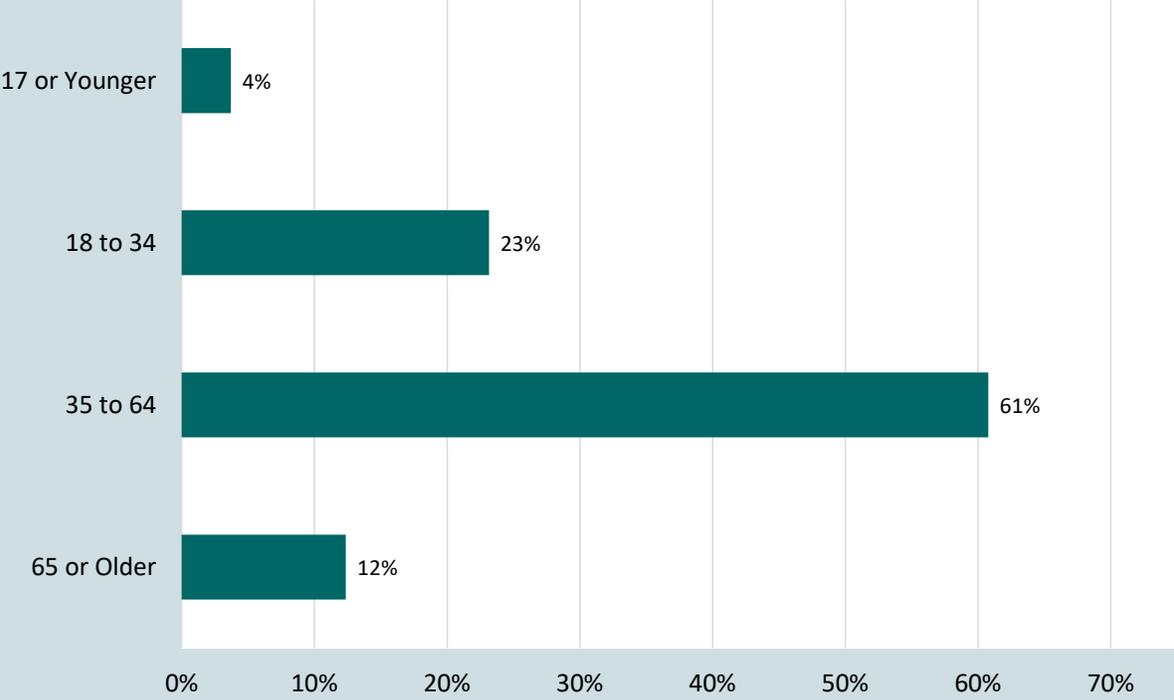
**Q15: Number of Cars Owned by Household**

Figure C-13 shows how many cars were owned by the respondents’ households. As shown, 8 percent of the respondents live in homes with no cars and 28 percent live in homes with 1 car. 64 percent of the respondents live in homes with 2 or more cars. A greater proportion of the survey respondents live in homes with either no or one car compared to the Truckee population as a whole, as the ACS estimates only 2 percent of households have no car and 22 percent have one car.

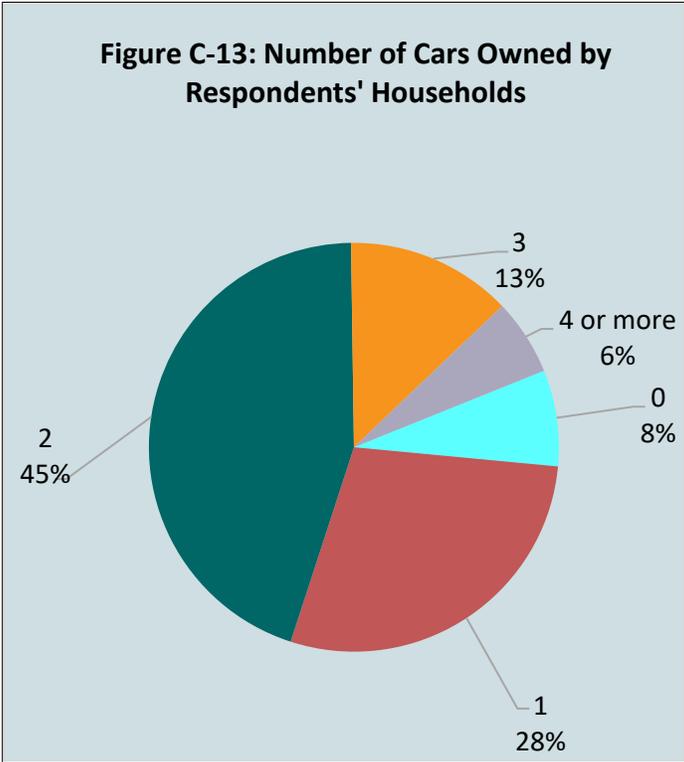
**Q16: Race/Ethnicity**

The majority of the survey respondents were white/Caucasian (78 percent). The next most represented racial/ethnic group were Latino/a/x/Hispanics (12 percent). No other racial/ethnic group represented more than 5 percent of respondents. Figure C-14 presents the complete data. This data is in line with the Town’s actual demographics, per the ACS 2022 5-Year Estimates: 81 percent of residents are white/Caucasian and 15 percent of residents are Latino/a/x/Hispanic.

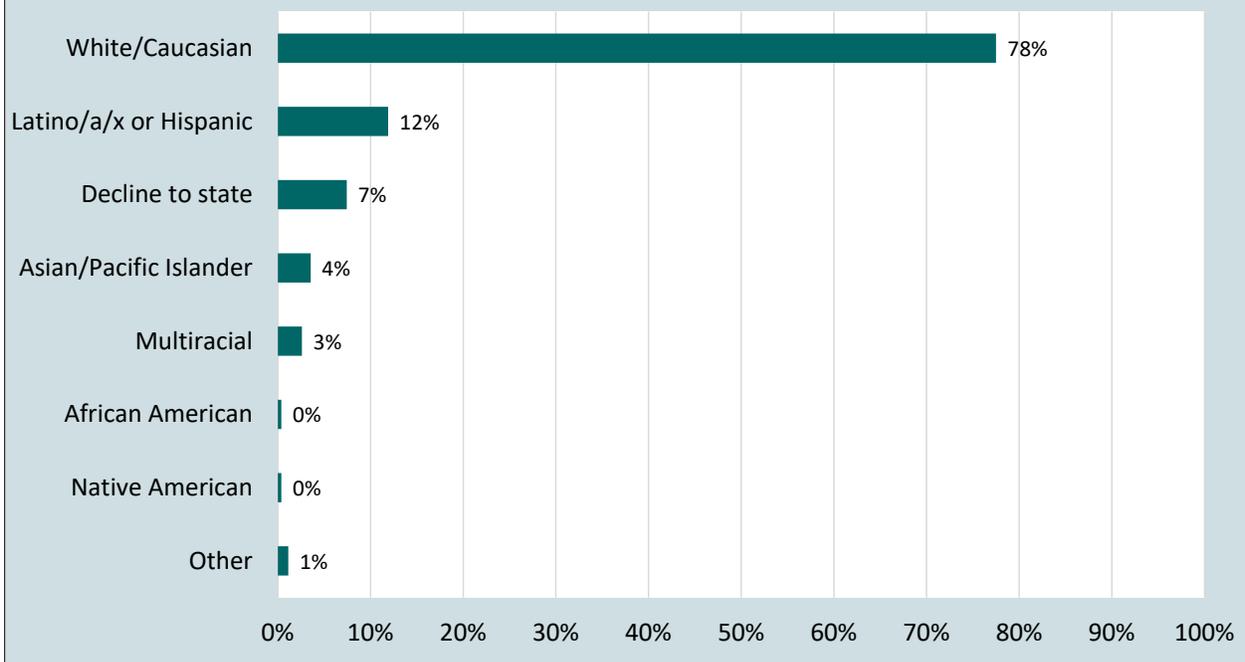
**Figure C-12: Age of Survey Respondents**



**Figure C-13: Number of Cars Owned by Respondents' Households**



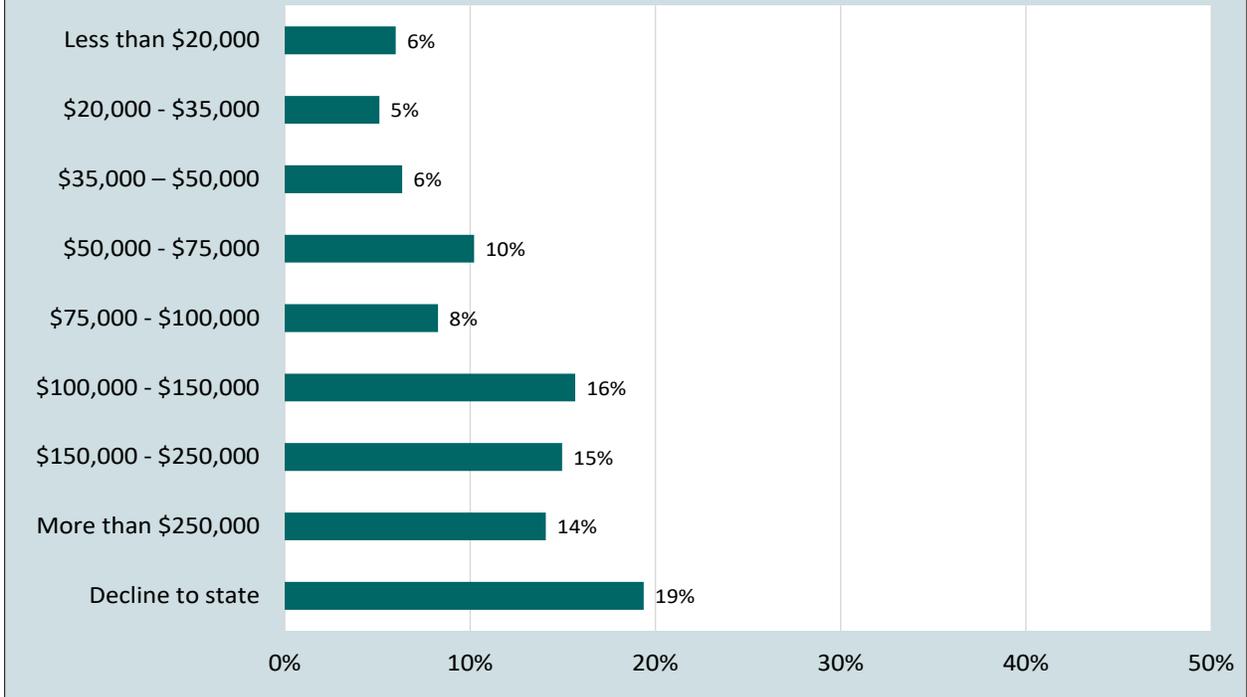
**Figure C-14: Race and/or Ethnicity of Survey Respondents**



### ***Q17: Annual Household Income***

The survey respondents represent a range of income levels, however more live in homes with higher incomes, as evidenced by Figure C-15. Of those that responded, 16 percent live in homes that earn \$50,000 or less per year, 18 percent live in homes that earn between \$50,000 and \$100,000 per year, 31 percent live in homes that earn between \$100,000 and \$250,000 per year, and 14 percent live in homes that earn more than \$250,000 per year. Overall, the income distribution of the survey respondents is representative of the incomes of the community as a whole; according to the ACS 2022 5-Year Estimates, 21 percent of Truckee households earn less than \$50,000 per year, 25 percent live in households that earn between \$50,000 and \$100,000 per year, 27 percent live in households that earn between \$100,000 and \$200,000 per year, and 27 percent live in households that earn more than \$200,000.

**Figure C-15: Annual Household Income of Survey Respondents**



## Individual Comments and Suggestions

### Accessibility

ADA vans would help.

### Add connections to Lake Tahoe

Employees need to report to work in Tahoe City to begin work at 7:30am.

It would be great to create an agreement with Placer County like you have with the regional tart to service Hopkins Village which is a full time resident development

Again, the biggest downside is that the distances available are too limited. Ideally, TART would offer rides from Truckee to nearby towns, not just within Truckee or within one town.

It would be helpful if TART Connect could go from Truckee to Kings Beach and/or Truckee to Tahoe City.

PLEASE PLEASE PLEASE make a connection to and from Truckee and Olympic valley. Not during the day in the winter. I completely understand. The traffic is stupid!! But... in the summer months it's not an issue. In the winter "at night only" during special events like winterwondergrass would be so incredibly amazing. PLEASE PLEASE PLEASE

Please connect to the tahoe city Tart Connect through winter and summer

Love it. It would be great to connect the Truckee area with north lake and other tart connect zones.

TART Connect should be able to travel across regions.

Bridge service to placer county

Deberían habilitar horarios más tempranos de Truckee a Kingsbeach

The Truckee service needs to be connected to Tahoe city

### Allow for scheduled rides

Needs reservation system for people who need to be somewhere at a specific time.

For middle an high school students it would be great for them to be able to schedule ahead of time for a group to carpool from the school to activities. Like if there are 3 or more kids they can schedule for the week and be able to depend on that ride for the group. It is better than those 3 or more parents driving their individual cars to the school and then back to work or home. (Like from THS to the tennis center in Tahoe Donner or ACMS to the Community Arts Center)

a schedule from KB to hospital area, not need to transfer or wait for others

The time of arrival is never guaranteed it will say 40 mins then show up in 20 or say 5 mins then show up in 40. When getting to and from work this is very difficult because i need to be there at a certain time and leave late at night and dont want to be waiting outside in the cold forever

### Concerned about cost

I think it is great service. However, I think the users should pay for it and not entirely the taxpayers (that may not be using it). It is basically free uber, but everywhere else, the user pays for uber and it is a well used service.

I am not sure about if it is the best use of money but maybe it is. I would need more data.

It is a Ludacris waste of money that serves only to as a free Uber for kids. Tourists will not leave their cars behind. It makes no sense that you can't go down 89 the Olympic Valley. Absolutely terrible insane waste of money

Don't continue

Invest in buses every 15-30 minutes. Mass transit moving hundreds of people saving thousands of kg of CO2

I think it should cost a nominal amount and not be free. Clearly the current cost is not limiting the service. A bus service with stops in Tahoe Donner would be more convenient than TART Connect.

I like the fact that you all are trying things. But a couple of things I'd like to understand better:

1. How does this help reduce traffic?

2. How does this help the environment?

3. Should this be a paid service \*if\* you aren't connecting to a bus? I can see this service being super useful to reduce costs of underutilized bus routes and encourage public transit, improve traffic etc. But right now with full free point-to-point service, I don't fully understand why this isn't a commercial service. Doesn't it basically compete with Uber? I would much rather charge people for non-bus-connecting rides and invest the savings in supporting a regular 5x a day bus to/from Reno.

Seems a lot more valuable to local businesses and the community. Would be awesome for commuters, tourists, locals going to the airport, people needing to go down for medical treatment etc.

## Individual Comments and Suggestions

Most of the TART connect vehicles around town are empty or have one passenger. It doesn't seem cost efficient. I've noted a number of instances of poor driving by TC vehicles. Some vehicles exhibit damage which does not inspire confidence.

Again, when asking people about the service it would be nice to know the cost. What was average cost/ride, total rides, drivers

Why are our tax dollars giving free transport to tourists. I like the idea but the town should charge for it even if it's a small amount like \$3.

### Expanded service area

Rides to/from Northstar in the Truckee zone would be nice.

It has no pick up in Glenshire

I work in Human Resources at The Ritz-Carlton, Lake Tahoe and manage all seasonal/international employee housing. We have been lucky enough to secure most of our housing at Sawmill Heights Apartments and in Northstar, however, it is my understanding that TART connect does not service those areas or service Highlands View Rd. up to The Ritz-Carlton, Lake Tahoe. Having service in these areas would be incredibly helpful for our staff who rely heavily on public transportation and the Northstar Village gondola to The Ritz-Carlton, Lake Tahoe. In the months when the gondola is not running, it becomes even more challenging to find transportation to the hotel. I am incredibly grateful for the service that is provided thus far, but would be ecstatic if the service areas could be expanded.

I would like it to help me get to work at Northstar. The regular TART is not often enough and unreliable.

Would be wonderful to serve local trailheads / ski resorts on Donner summit that can not be reached via transit.

love the program, also love the added Bike racks, wish we could use it to get to Sugar Bowl in some way! Keep it forever

It would be helpful if tart connect provides rides to Donner Lake.

It's incredibly unfair that Donner summit is not included in the network. Sugar Bowl, Boreal, Woodward, Soda Springs and Donner ski ranch are PART OF THE COMMUNITY and it's discriminatory that our employees and guests are left out of the program. FIX THIS! Why does Tahoe Donner get access to this benefit for their staff, but not other large employers?

Late at night and to Northstar please

Great, only doesn't pick up in my neighborhood because its out of bounds.

Would be great if it could operate in Placer County adjacent to Truckee (Tahoe Expedition Academy, Lahontan, Schaeffer's Mill, Martis, etc.)

I wish the service went from Truckee to Northstar. The limit on the connect service is around the 7-eleven. A lot of people live in Northstar and go to Truckee (I talking about the on demand service)

Please include the placer county side of Sierra meadows

Please extend the area to include all of Sierra Meadows, as well as extend the hours into the night so help keep a safer option available to those who have been drinking.

Please connect to Northstar

It doesn't make sense to me that I live in Truckee and I can't go to Northstar using your service and if I live in KB having rides only after 6 pm is not ideal

Please extend service range to all of sierra meadows. Need easy service to resort areas like northstar and palisades from truckee

Start as early as possible.

Extend service to Sugar Bowl/Norden in the winter.

Make ski racks available in winter and bike racks available in summer.

it would be great if you could take it to the mountains to ski (Alpine/Squaw)

I wish tart would include meadow view place in Truckee

Go up the summit

Service to olympic valley.

More cars available.

It would be nice to expand to places it doesn't go to or at least have stops around areas it doesn't go to so more people can have access

I need to get to Sugar Bowl. I can't be the only one.

I'd love to use your service as would my non driving teenage son, but you don't service our area and I'd prefer he not walk home to/from the drop off/pick up location in the dark.

It is disappointing that it does not service all of Sierra meadows including the area we live in (ponderosa Dr and palisades Dr). Not sure the reasoning as it services a block above us.

It doesn't come to all of Sierra Meadows

We would like to be picked up in Alpine Meadows neighborhoods, not just at the river ranch- because we'd have to drive there and park.

Me gustaría que fuera a nortstar, en el invierno es muy peligroso para mi manejar en la nieve

## Individual Comments and Suggestions

We don't use TaRT because there is no dedicated HOV lane making all passengers in tart or own car wait in the same traffic jam on SR 89, so what's the point.
We have such a problem with transportation, parking, road congestion and drinking and driving in our community I wish this service was more dependable, prompt and better used by our community year around.
We live in the mountains. This kind of public transportation is not realistic. They are always empty. That means multiple trips on the road that would have normally required one. The driver has to go pick them up and then to the destination. We are too spread out for it to make a difference.
The waiting time to find a driver is crazy. <input type="checkbox"/> 90 minutes, 75 minutes. <input type="checkbox"/> It has been difficult to be able to arrive to the bus stations with the waiting time and also I live in Truckee but tart won't come to Schaffer Mill Rd so is a 25 minute walk to Nshore rd and Truckee airport rd to arrive then wait 75 minutes for a driver to be found. <input type="checkbox"/> It will be amazing if tart could cover Schaffer Mill rd
One of your drivers is creepy and I know lots of people who think that
I live in Glenshire, and it's very hard to know how long before you need the pickup to request it.
The app is buggy on Android! Please help fix it! The wait time/confirmed ride screen freezes and doesn't show the wait time. The other issue is common on all phones, I believe; wait time shows >60min, then suddenly shows <5min when there isn't enough time to get ready, so we often need to cancel the ride.
Wait time estimates are inconveniently inaccurate — increase and decrease significantly enough to warrant canceling and rescheduling rides, after the driver is on their way.
I hope that the app's ability to estimate driver arrival improves. Sometimes, the driver ETA will decrease by a huge percentage, so it's hard to plan for.
Person who resides in Truckee fulltime should not be driving, yet he cannot manage the App and is frustrated due to bad reputation of timeliness for the bus. Cannot accept that this shuttle/connect service will actually be on time or arrive as scheduled due to this.
Not reliable and includes long waits
TART serviced in the Truckee area zone are not nearly sufficient as the Tahoe City area. Wait times for rides have mostly been 69 - 90 mins for me, which is not satisfactory ...not dependable...not useful
ETA can be really inaccurate
Evening usage is impossible. Often 80+ minute wait estimated that extends out even further. Can't plan anything around it
Please do not allow pets. Pet dirty footprints are often on seats and the floor, and pet hair is also a big problem .
there was this other guy in the car that was very weird
its great but please the cars all smell weird
Get new drivers who do not suck. I have been cut off and almost hit because they are impatient. On numerous occasions always the ones who drive the vans.
The 90+ minute waits from early afternoon on are unacceptable for most uses. Hmm, go grocery shopping which may take 30 minutes. Want to go shopping at 3P so make the appointment for 1:30P. But when to book the return trip. If made when being dropped off, wait for an hour with groceries to get the return?
Having to book 2 TART Connect rides can be time consuming.
Some of the worst drivers around. Have been almost in an accident multiple times from the unlawful driving that has been experienced
Some drivers are rude and not patient for the time being

### Other

Becoming a larger part of working community form of transportation. Spring/Fall are as important to our employee base.
Making the tipping screen come up when the trip finishes. It's a free ride, people should feel comfortable tipping and would probably tip more if more directly prompted
re: 8 or 9, depends on who. Answers would be different for visitors vs. residents.
Please require masks - many people who can't drive are elderly or have health issues that put them at greater risk of Covid.
I love TART connect, but honestly I wish we could be like every other mountain town I've been to. Reliable (every 15 minutes) bus service seems like a way better solution to numerous issues in our community. I realize that hiring CDL drivers is tough, but somehow Mammoth, Jackson Hole, Crested Butte and even Sun Valley can do it. I know its tough to justify when nobody ride the bus, but I think its because it is just totally unreliable currently. If I could walk a half mile from my house to a bus stop, wait 15 minutes max, be brought to the transit center where I wait another 15 minutes max to hop on a bus to work at Palisades I would do it almost every day. This combined with a third lane for bus/emergency vehicles on hiway 89 (don't have to do anything to the mousehole, busses can take west river) could actually do something to address traffic issues while helping the environment. Hard to see how a 10 passenger tart connect with a driver and one passenger in it is helping either of those issues.. <input type="checkbox"/> We should get on board with every other mountain town, not cater to laziness... <input type="checkbox"/> <input type="checkbox"/> That said I'll still use tart connect because the bus is unfortunately not a real option.

## Individual Comments and Suggestions

A roof top ski rack would be nice to get to Tahoe Donner xc ski.
I would say that there needs to be a way for someone to contact Tart at 10pm if their driver left them after not waiting longer than two mins. I had no ride home and it was late at night and my driver left me at SAVEMART grocery store. That is dangerous. He waited less than three mins from time the app said he had arrived to the time I walked outside and he was nowhere to be seen. There was nobody I could call or reach on phone to request to still be picked up since I ordered the ride before 10. He left me there and something bad could have happened to me and it has bothered me since and I haven't used the service since this happened.
I use it when I need to get back to Tahoe dinner from Truckee. I would use it more if it ran more frequently.
Could you consider a food service
Need more service to/from Tahoe Donner
Is there a method to check how long a delay there may be so I know how far ahead to call.
Ability to tip the driver through the app would be nice and remove the barrier of cash or Venmo details.
Do we have to tip?
It difficult when customers are not waiting for service as tip is only payment. Rating like Uber on customer and rider?
I wish all route could be accessed at the community center because the parking is better than the train depot

### Positive

I think its a great service that is well managed
SO far fast so good! <input type="checkbox"/>
Keep it up! <input type="checkbox"/>
Thank you!
I think this is the best improvement Truckee has made in a long time. Thank you so much for making it available. It keeps traffic down, provides transport when walking or bike riding is not a good option (due to weather or distance), keeps drunk drivers off the roads, provides an option for teens that can't drive to get around, and so on. I am really grateful for this service. It has been a wonderful program for our town!
I love this program and hope that it continues! Such a great way to help the environment and lesson parking congestion. Providing the program late at night helps keep drunk drivers off the roads. I wish there was a way to connect truckee to Olympic valley
We have to get off gasoline. TART is our future. I'm in my 60s been driving for 40+ years. I just need to figure out how to do public transportation. I do drive a tesla, but still! <input type="checkbox"/>
Great service.
I think it's a wonderful program and can't wait to use it myself!
This is a valuable service that permits us to be a one car family.
This program is great and I would like to see it expanded to other parts of the lake and ski resorts as is the case in other resort towns in Colorado and Utah etc...
I really appreciate the service. <input type="checkbox"/>
It has helped me tremendously while not having a car available. <input type="checkbox"/>
Public transportation is an important alternative to using a car! <input type="checkbox"/>
I might not even come up to Truckee if PT is not available.
TART is a great model for public transportation.
I think it is an amazing, great program and would love for it to be expanded and to use it more! Wonderful resource to reduce drinking and driving and once expanded, will be great for reducing traffic to the ski hills!
Love It!!!
Love your drivers. Courteous & helpful.
We would love to see this service expand and hopefully effect the regular TART service. Our business and clients are hoping a bus is coming that will service Tahoe City and Kings Beach separately, so that our disabled clients will not be on the bus for so long. They are sometimes on the bus for more than 2 hours and that goes against ADA regulations. We are so very grateful for this service, however. We hope you get the funding for this additional bus!!! Thank you! marlieseb83@gmail.com
Love the program! Just would like clarity on if small children are ok to ride
Amazing that Truckee does this.
I think it's fantastic.
Love the service and app, wish more people would use it
The drivers are awesome

## Individual Comments and Suggestions

This program is amazing. please keep it going <input type="checkbox"/>
This is the BEST service added in many years!
Keep it anyway you can
This is a great option for public transportation.
Only visit occasionally, but think is a great service
Lovely drivers.
Love the TART especially in the slack seasons
I am only in truckee / Donner for the winter but I love having it available to me while I am there! Thank you!
It's a wonderful service, thank you!
Love this program! Please keep it and help it grow!
Very supportive of this program and hope it can continue. Hope more people can become aware of it.
Great program
Great resource!
i love it - and grateful that our communities have created this essential program -
I am thrilled to see public transportation at no cost available to the Truckee-Tahoe community! What a blessing!
I love having TART Connect so much. As I mentioned above, my biggest/only problem for me isn't the wait time, it's that the estimated wait times on the app are not reliable and often change drastically. long waits are fine if they are predictable!
Muy excelente servicio
I would take tart connect everywhere, every day if it was often available. I'd love for it to go from Truckee to palisades as well!
It is so wonderful that Truckee has the TART program
Love this offering. Looking forward to taking advantage of it.
So far I think TART has been doing a great job. I'm appreciative of the service.
I love what the program represents and appreciate all they effort. I've seen elderly people getting dropped off at grocery stores using it and I think it's great for visitors that aren't comfortable driving or aren't equipped to drive in the snow. However, I'd prefer to see funds around transportation directed towards improving the bus availability and frequency and infrastructure to support bike travel so ultimately there are fewer cars on the road.
TART Connect has been incredibly helpful to me. When I was injured and couldn't drive, I was able to get a ride to appointments. When I would like to go out with friends, we take TART connect to avoid drinking and driving or finding a DD. And when traffic is bad, TART Connect is great to avoid parking.
Tart Connect was terrific for my teenage kids who needed rides to school activities, friend's houses, etc. It's safe and reliable. Like the idea. Just takes us us using it the first time to realize it really will be convenient and to keep all the cars off the road. We will try it <input type="checkbox"/>
This is the best use of tax payers money I have ever seen, tart will always have my support. Who knows how many drunk drivers this has kept off the roads and the lives it has saved, worth every penny. With the spotty Uber\ Lyft coverage up here, tart is essential.
Great resource for the community, please continue and expand!
Our youth really benefit from this service. My 15 year old daughter uses it to get to and from work and sports.
Amazing thing to offer saves alot of waiting and bus stops
One of the best programs ever thank you!!! I will use it more often as my children move to booster seats
I love the concept of having it available.
Great service with friendly staff! Just wish it ran later when I most need it to get home safe!
This is a great program and we should keep it all year round.
Please keep TART Connect! It's amazing, and I'd love to see it expanded.
It is an amazing service and I see the value not only for me but for others.
It is a wonderful service.
I love that we have the Tart Connect as an option for getting around town! Truckee has been struggling with public transportation that is reliable and on time, and this makes it so much more convenient. I think it's a great resource for the town.

## Individual Comments and Suggestions

It is great that we can see now the estimated time before booking a drive!
The TART service is so convenient for me as a winter seasonal visitor with family living in Truckee. □ I'm not comfortable driving in winter conditions but with TART I'm able to travel to the ski areas and not inconvenience my family for rides. I am able to spend more time in Truckee because I don't have to rent an SUV or burden my family.
It is without a doubt the biggest and best improvement to the Truckee area as I have seen in my 18 years here... Yea there is the tart bus, but so many of us live too far off the path of the stops. Getting to know the drivers, having reliable transport to/from work, it is something that is unreplaceable. Absolutely amazing.
My only suggestion is keep it up! It made a big difference to our vacation in Truckee.
keep it free. thanks!
I think it is a wonderful service. I would use it more often but while visiting with family I am often able to use their car for errands etc
Tart has been the best when I go to the bike park I have tart take me and they always have a bike rack that's my favorite
Tart connect is filling an important space since ride shares are difficult to find in Truckee. I haven't been able to use it because I live in "upper" Sierra Meadows which is just out of the service area. Also, we like to go to local restaurants and music and it is often impossible to get a ride home - especially after 10pm
Wonderful service.
Great addition to the community! Have 1 car shared between 2 people so it's great for schedule conflicts / car unavailability. Stopped us getting a second car
I call TART Connect for multiple visitors per month as I am concierge at the Welcome Center. I also recommend that visitors (especially those staying in Tahoe Donner) download the app to their phone and use the service.
This service amazes me and I wish I had known about it months ago. I generally walk/bike and use the Truckee Local route but when I need a Connect— hallelujah! This service enables me to maintain my car-free lifestyle in a challenging environment which is very meaningful to me. Thanks everyone
Love it! Get the segregated private HOAs to fund it! (I'm in Tahoe Downer.) And keep picking up the high school kids.
I'm very grateful for the amazing service!
Please continue this service, it is valuable when my vehicle breaks
Terrific service!
it's really great as an option and especially for teens who aren't driving yet and can get around
It's a fantastic service - I use it often.
great service. Keep it going. □
Wonderful service for families
Program is great. Drivers have all been friendly and helpful. Great that vehicles have bike racks too. Drawback seems to be low utilization from my experience. I have only shared one ride/part of a ride w another party. It's great to save me gas \$/parking hassles though if I'm the only party, it's not doing anything for the environment. Hopefully more people use it as time passes. It is such a fantastic resource for our community.
We loved it. A partnership with Amtrak may be mutually beneficial?
Love the program!
it's a great program
Amazing program. It would be great for it to be permanent.
It's a great service. I hope that becomes a permanent year-round service.
My family loves TART! It is especially great for my non-driving teens, but they have often had to wait up to 90 minutes for a pickup. That doesn't work well - and they certainly could not use it to get to appointments/practices in a timely manner. Perhaps more drivers??
Driving/parking is harder in the summer and TART is most useful during that time.
Legacy trail aside, this is the best thing to come to Truckee. I've lived here my entire life, and I couldn't be more stoked in this service. Thank you!!!
Such an awesome service, really appreciate that it is offered.
It's a great service for the community. But it's sad that the kids abuse it especially the high schoolers. I was on a ride when we picked up a kid from Truckee High School and took him a block and a half down Donner Pass Road. During lunch the high school kids book rides to go to Safeway. This is a waste of our resources.
Such a great service to the community
The program is great, I hope more people use it.

## Individual Comments and Suggestions

This service has been essential to me and my family. We can't express enough gratitude for this transportation option as it has allowed options for us that would not have been there before. This service has become essential for us.
This service is extremely helpful for PCT hikers like me to get groceries, etc.!
Excellent service. Thanks.
Great service and friendly staff. Just recommend enabling trips between the different regions.
This is the greatest thing for our town. Keep it going!
It's awesome
This a a vital service to keep traffic down and our kids safe.
Thank you for the TART Connect program. Please keep it going.
This is a great program and I hope it continues. We look forward to using it more as a family and having our kids utilize it
Love the program!
I really like using TART Connect! It's easy, enjoyable, and convenient.
Really grateful for you guys! This is Laura Visconti, my husband and I own DRINK COFFEE DO STUFF :)
Love the program!
TART connect is a huge success, is much more convenient than fixed route transit, and if a choice must be made between reducing fixed route and increasing TART connect then connect should be increased.
I think tart connect is awesome.
Very convenient. Great service!
This is a stellar program even if it takes a little longer than driving your own car. I fully support expanding it if there is demand. TART Connect + Ebikes should be the future of Truckee.
It's a great program but the rides need to have a locked in pickup time
Fantastic service!!! We love that this is an option for enjoying a night out in truckee
The program was highly efficient when we visited
A true blessing to PCT hikers. Thank you!
Love it
I love TART! I mostly use it to go to downtown Truckee from Tahoe Donner with my friends, and no one has to DD. I loved when it went to midnight during summer, but no complaints.
Your service has helping me and many friends a lot thanks.
This is a fabulous service for Truckee...wholeheartedly support its continuation!
I enjoy the option of getting a car ride to my destination.
More TART!
Great program!
It was so easy to use, I am considering using it for other things — like dinner out (to avoid having to deal with parking and so that I can drink), and maybe certain medical appointments.
Everything about the tart connect is a phenomenal idea. Griffin, Ryan, Scott are just great people for the service
TART connect is a *vital* resource esp. for our local teens and youth, and community members who either don't have reliable transportation, or don't whose vehicles aren't safe for winter driving . It allows many students to participate in after school sports or programs that school provided transportation might not otherwise allow. Our community needs to continue to provide resources and means for those with lower socio-economic-status to thrive in this area. Any community resource that supports working class or youth who have to "figure things out" are essential to boost. Please consider equitable ways of distributing this survey- incentivizing posters for in-person engagement (not just social media), QR code on tart connect, survey in Spanish, text those who are coded users of the resource, to ensure you're getting feedback from those who use the resource!
Winter would be great! It's so hard to find any options for rides home after holiday parties etc
This program has been a lifesaver getting my high school freshman son to & from sporting events and other activities around town!
Tart connect is an amazing service and was so needed to allow those living in Tahoe Donner to have access to public transit. It has been amazing to have the service to allow myself and children to attend activities in Truckee when we don't have a car available. ☐
☐
As an area of improvement, it would be great if the winter wait times improved.
Love Tart!
We just moved here and this is the BEST! The drivers are so nice and always explain how positive using TART is. We love it.

## Individual Comments and Suggestions

This service has been a life saver for my daughter. Thank you ToT for this service and adding spring and fall to your schedule.
Thank you for providing this valuable service!
TART Connect is the most wonderful bus service I have EVER seen in my life and I am 78 and have traveled A LOT (inside the US and outside).
I think this is an amazing service for our town and I tell everyone visiting us about it. I just haven't personally used it because I always have my little kids with me and could not carry/install car seats to utilize this service right now. However I do plan to use it in the future!
I travel for work, but sold my car 6 years ago instead using Amtrak and the bus to get around. TART Connect has been a great addition and a good bridge to fill in where the TART bus does not go.
I think it's a great service that fills a need in the community and I look forward to using it more in the future.
Thank you
TART connect is the greatest thing for Glenshire since the Legacy Trail was finished.
The drivers are very friendly too!!
TART has been an immense help to this community. I don't think I'd suggest anything else my highly. A friend of 10+ years has moved from NYC to make Truckee their permanent home and TART is a staple of our transportation.
It is great.
It is an exceptional service!!!!
Absolutely LOVE this service! The drivers are always super friendly and it's so convenient. One time, I had a ride cancelled on me with no explanation, which was pretty frustrating, but other than that, it's always been accurate on timing and reliable.
Me parece un gran servicio que ayuda a la comunidad, aunque a veces tarda demasiado.
Muchas gracias por este servicio que tanta ayuda nos da!
Creo que es de los mejores servicios en Truckee. Trabajo en un restaurante en el centro y siempre recomiendo que se utilice.
Creo que tuvieron una idea brillante para resolver el tema de la movilidad en un nivel muy práctico pero falta ajustar muchas cosas para que funcione mejor. Los tiempos de espera frecuentemente son demasiado largos para que la gente use la app. Usar tart connect no solo ayuda al medio ambiente sino que reduce la dependencia del automóvil por lo cual si mas gente la usara habria menos trafico, menos accidentes y las calles serian mas seguras a cargo de conductores responsables. Es por eso que es NECESARIO que inviertan en mejorar la calidad de servicio que brindan a los usuarios.
Muchas gracias por excistir yo soy una mama soltera a sido mucha ayuda este programa
Me encanta el servicio mi esposo lo utiliza a diario me gustaría que lo dejaran asta las 10:30 pm a 11:00 sería magnífico para nosotros
Me gusta mucho usarlo
Creo que es un programa increíble que beneficia a demasiadas personas
El servicio es excelente, aunque me gustaría que hayan más TART connects en las horas punta de la temporada de invierno
Cualquier mejora al servicio seria de mucha utilidad ya que el tra spirte publico en ge eral es muy limitado

### Reduce travel times

Hire more drivers to reduce wait times!
Very happy with the service. Would love to see this expanded so that wait times are not as long and timing can be more reliable. Avoiding parking, and being able to get tipsy, are game changers for accessing the downtown and surrounding businesses from Tahoe Donner!
I would use it but it is unreliable and/or wait times are long and I can't be late to work. Also, doesn't go to my winter work location (Northstar) from Tahoe Donner.
Improve hours (earlier and later) <input type="checkbox"/>
Also improve wait times. I was going to take it and had to wait for 40 min in order to catch the train. I ended up having to drive because it took too long. <input type="checkbox"/>
Also time estimates vary a lot. Sometimes it says the car is 17 minutes away and 5 minutes later it is 2 minutes away. Doesn't allow for very accurate planning.
timing on the app can be erratic having a big swing on pick up times when ordering ride and actual arrival times
I think for most users pick up time is most important, many people( but not all) are flexible with pickup times. Reliability is soooo important with public transportation. I " must" be there at 10:00! No later!!! Think of job interview or Dr appointment or lawyer appointment etc. These are times that we can't be late.
I am grateful for TART. My only suggestion is more drivers sometimes you end up waiting an hour standing in the cold with groceries.
Please update the app to ensure the estimated times are correct and more drivers/cars!

## Individual Comments and Suggestions

I stopped trying to use it Bevin was too busy. Usually over 90 minutes for a pick up.
Need more connect vehicles to reduce wait time
I am very supportive of this program, however I think the wait times are problematic. I'd be more supportive of fixed neighborhood routes that connect to more frequent public transit. My longest wait time over the summer was over 150 minutes...which makes the service almost unusable. I love the idea of free public transit—but it needs to be more convenient than driving. The long wait times associated with TART connect made me only use it in extreme situations (car was in the shop, etc). That being said, I do think it is better than nothing and the service shouldn't stop...just improved to reduce wait times.
Sometimes it's not the most reliable. Or the wait time continues to get longer and longer before my ride gets cancelled. This has made me less likely to use TART connect
Maybe run the buses a little more frequent.
Faster waiting time
I think the tart connect program is great. But wait times can be unpredictable and very long especially in inclement weather, which can make getting to work tricky. I don't mind walking to bus stops but the buses seem to come very infrequently and never seem to be on schedule. I would prefer more buses that come frequently (every 10-15 mins) and show up when they're scheduled to.
We loved it. The only problem was getting rides at peak hours. You just need more drivers.
Many of the long wait times, according to drivers, is due to high school students wanting rides to McDonald's, etc. Is there a way to prioritize people who need a ride to work or the hospital or doctor appointments? Would it be possible to have a shuttle dedicated solely to the high school? Just wondering, as Tart Connect has helped us 80-year-olds immensely and we THANK YOU!
They need to adjust the time because itll say a certain time then go up by 30 minutes or go down.
The program is great. Although some times the service has back up times that don't work
It used to be fantastic but recently the wait times are way too long for it to be a reliable alternative to driving.
Long wait time
I would use it more if there were less of a wait time for 9 am arrival and 5 pm pick up. Those times are busy with J1s I have observed.
Wait times too long
Reduce wait times to be more consistent under 30 minutes.
Provide more accurate wait times- sometimes it would say 90 minutes and the car would show up 20 minutes later before we were ready
It's a really great service when it works. Waiting longer than 30 minutes is not a feasible way to operate. We have ordered a tart and the says 30 minutes and then at the end of 30 minutes it adds another 30. When you need to be somewhere at a certain time, it doesn't work.
Honestly I love this service! I just wish wait times weren't that long.
Giving priority to connect to/from the tart bus would be good.... I'm afraid if I take the tart bus to Truckee from talisades Tahoe, the wait time will be too long to get tart connect to my home.
The wait times make it unreliable
The wait times are ridiculous in my area and I've found towns where they actively avoid picking you up until you cancel the I end up driving. Tart should only be for those that live here full time especially when it's busy season. I work downtown and sometimes have to walk extremely far to from parking to work or can't get parking at all. <input type="checkbox"/>
<input type="checkbox"/>
We need to service those serving this community not visitors.
It can be a wait at times
I love the tart and with the increased number of vehicles wait times have decreased making it an even more convenient choice. I wish it ran until midnight to provide a safe option to get home after a night out.
It's great but often just has over 70 minute wait so is not convenient. Also it's scary to take when you aren't sure about the wait time to get home. I once took it to the grocery store but when I requested the ride home was over 99 minutes . It was summer and I had perishables so it wasn't the best. The never considered using it to go grocery shopping again because of the uncertainty of the return trip.
It's hard to recommend when the wait times are so long in the evening. Sometimes it'll be 70+ minutes wait and after 60 minutes has passed it's still saying an additional 30 minutes wait. I can't go anywhere with that kind of scheduling
The only downfall can be waiting time for a vehicle to pick you up.
En ocasiones se satura y tarda hasta 2 horas en brindar el servicio.
Aumento de los buses

## Individual Comments and Suggestions

### Reliability

Just your mapping for the app.... I have scheduled a ride, been told "40 minutes" and drivers show up in 15 minutes. I know that one person, cancels, or 2 people cancel— it becomes a downhill slide in times. I've also had a pick up from away from my home— and the waiting time went from 10 minutes on the app, to 18, 23, 30.... I think the longest AFTER requesting a ride, it has gone from 12 minutes, and watching the time increase on the app to waiting over 30 minutes after being told 12 minutes to wait for a ride. (Usually around noon). Thanks for this service!!

notifications so to not stay on the app and save phone battery. Better estimate arrival.

Can you fix the ETA of arrival so the number accurately shows how long it will take for the Tart to arrive? I've noticed that the ETA will go from, for example, 12 minutes to 54 fairly often

If it were more reliable from a time-to-pickup perspective we would use it even more often.

Keep it up!! The wait times are not accurate. So had to rush one time.

Some times my driver cancels due to the maps taking them to a gate that isn't open.

The main issues are the wait times, so it's not useful for last minute plans. Also having to kill time waiting for a pick up. Tart connect is the best service this town provides and should become the norm. I wish it were connected to Tahoe or that it were more reliable to be able to catch the bus to Tahoe and Northstar

I wish the app was more consistent and accurate. I've had many incidents where the time to get the car is 45+ min which is fine but it's usually never even 45 min. It's usually 60+ to wait. I even had the time go down to 3 min for a car and then jump back up to 35 min. I get things can change but I wish there was more info and more accuracy for when your driver will pick you up

I'm not sure if you updated the app, but several drivers had problems with the routes the app showed them.

I mean, for example:

I would pick me up in Olympic Valley to Tahoma, on the way pick someone up in Squaw Creek, and then again it would come up that I should pick someone up in Olympic Valley because it just came up on their radar, and in reality the person had requested hours before, but also no available drivers were showing up for them even when they picked me up in the first place. It wasn't the driver's fault, they do an amazing job and are very friendly.

### Request for further driver training

More training for the drivers would be efficient ie.. following speed limit especially in neighborhoods and when children or school is in session.