

Analysis of Humboldt Transit Authority (HTA) Dial-A-Ride (DAR) Service

Prepared for the:
Humboldt Transit Authority
And
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Prepared by:
David Kack,
Natalie Villwock-Witte,
and
Karalyn Clouser
of the
Western Transportation Institute

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The contents of this report express the views of the authors, and do not necessarily represent the views of the Humboldt Transit Authority nor the Humboldt County Association of Governments.

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Introduction

The Western Transportation Institute (WTI) at Montana State University (MSU) is providing technical assistance to the Humboldt County Association of Governments (HCAOG) and the Humboldt Transit Authority (HTA) through funding received by the National Association of Development Organizations' (NADO's) Research Foundation, which originally came from the United States Department of Agriculture (USDA).

Working in collaboration with HCAOG and HTA, the major tasks to be undertaken as part of the technical assistance include the following:

- Investigate the Feasibility of Vanpools
- Review and Recommend Commute Trip Reduction Incentives
- Analyze HTA's Dial-A-Ride System
- Analyze the Eureka Transit Service/System

This document provides an analysis of the Dial-A-Ride (DAR) system. Dial-A-Ride systems/services are also known as demand-response systems/services, in that a DAR vehicle will not move unless there is a scheduled ride. This is unlike a fixed-route transit system, where vehicles/buses move around a route at set times, regardless of the number of customers/riders on the bus.

In general, the purpose of this document is to provide a high-level analysis of HTA's DAR system and provide a review of how the cost of the service is divided among certain jurisdictions (governmental entities) in the area, and how the distribution of the costs may be modified moving forward.

Dial-A-Ride Overview

Dial-A-Ride (demand-response) systems can be open to the public or can be limited to certain "qualified" riders. Because HTA operates fixed-route services in Arcata and Eureka, by law (49 CFR Part 37) they must provide paratransit services. According to 49 CFR Part 37, "Paratransit means comparable transportation service required by the ADA for individuals with disabilities who are unable to use fixed route transportation systems." The current DAR service provided by HTA (currently contracted to the City Ambulance of Eureka or "CAE") is open to persons with a disability "or those who apply for and are determined to be eligible for the service."

In addition to who is served by the DAR service, it is important to know where such service must be provided. Regarding the area to be served, 49 CFR Part 37 (§ 37.131 Service criteria for complementary paratransit) notes the following:

- (i) The entity shall provide complementary paratransit service to origins and destinations within corridors with a width of three-fourths of a mile on each side of each fixed route. The corridor shall include an area with a three-fourths of a mile radius at the ends of each fixed route.
- (ii) Within the core service area, the entity also shall provide service to small areas not inside any of the corridors but which are surrounded by corridors.

(iii) Outside the core service area, the entity may designate corridors with widths from three-fourths of a mile up to one-and one-half miles on each side of a fixed route, based on local circumstances.

(iv) For purposes of this paragraph, the core service area is that area in which corridors with a width of three-fourths of a mile on each side of each fixed route merge together such that, with few and small exceptions, all origins and destinations within the area would be served.

From a general review of HTA's DAR service, the service goes beyond the "requirements" as noted from 49 CFR Part 37, in that the service provides rides far beyond the ¾-mile limit.

History of DAR in Humboldt County

HCAOG has a long history of supporting and working towards efficiencies in paratransit services throughout Humboldt County. For decades, paratransit throughout Humboldt County has been provided by a complex network of public and private organizations. HCAOG has funded DAR service outside of what is mandated by law since the early 1990's.

In March of 1990 HCAOG voted to appoint the Humboldt County Association for the Retarded (note this organization has since changed their name to Humboldt Community Access and Resource Center but retained the acronym HCAR), as the Consolidated Transportation Agency (CTSA). At the time HCAR was one of the private organizations providing para transit services and served more passengers than the others combined. Appointing HCAR as the CTSA it made them eligible to receive State Transportation Act Funds.

Shortly after HCAR was appointed the CTSA, in July of 1990, the Americans with Disabilities Act (ADA) was passed. This Act had wide-reaching effects including requirements for paratransit services as noted above and in Appendix C.

The ADA required transit agencies to submit Complimentary Paratransit Plans. However, even with these planning efforts there were still gaps in service for those areas where fixed route services did not exist, and the mosaic of providers was still necessary to meet the need.

From 1990 through 2015, HCAOG contracted directly with HCAR, for a portion of the cost to provide paratransit services along the Arcata Eureka corridor and greater Humboldt Bay region. HCAOG's contribution came through State Transit Assistance Funds.

In April of 1992 HCAOG commissioned the report: *Humboldt County Paratransit Coordination and Consolidation Plan Report No. 1*. This report found that quality of paratransit service available to an individual in Humboldt County varied widely depending on where they live, what kind of disability they had and what social service agencies they may be affiliated with. The greater Humboldt Bay region was particularly concerning, because even though it had high population levels there were a lot of limitations on paratransit. Namely that Arcata and Eureka DAR services would not go between communities or serve areas outside city limits such as Humboldt Hill, McKinleyville, and Cutten. The following chart was included in the report:

Summary of Paratransit Providers

Agency	Service Area	Type of Service	Hours of Service	Eligible Riders	Estimated Ridership (Monthly)	Operating Cost
Arcata DAL	Arcata City Limits	Demand Response	Mon-Fri 8am-5pm	Only those unable to use Public Transit	50	\$23,000
Arcata DAR	Arcata-Mckinleyville	Demand Response	Mon-Sat Variable	Only those unable to use Public Transit	321	\$41,559
Eureka DAL/DAR	Greater Eureka Area	Demand Response	Mon-Sat 7:30am-5:30pm	Only those unable to use Public Transit	4500	\$197,192
Fortuna Senior Bus	Fortuna City Limits	Demand Response	Mon-Fri 9am-4pm Sat-Sun 10am-3pm	Seniors (60+) or Disabled	1055	\$17,493
Quail/RSVP	Highway 101 from Benbow to Weott	Deviated Fixed Route	Mon-Fri 8:00am-5pm	Seniors (60+) or Disabled	32	\$51,529
Redwood Care Centers	Eureka, Arcata & Fortuna	Demand Response	Mon-Sun 7:30am-6pm	Facility Clients	160	\$3,700
United Indian Lodge	Humboldt County	Demand Response	Mon-Fri 7:00am-9pm	Native Americans	NA	\$4,583
Kings View Mental Health	Arcata, King Salmon	Demand Response	Mon-Fri 8:30am-4:30pm	Program Clients	220	\$7,984
Adult Day Health Care	Arcata-Mckinleyville	Deviated Fixed Route	Mon-Fri 8:30-10:30am 2 :00-5:00pm	Day Care Clients	760	\$33,885
HCAR	Greater Humboldt Bay	Deviated Fixed Route	Mon-Fri 5:30am-7pm Sat 7:30am-6:30pm	Seniors & Disabled	16,800	\$319,843
Humboldt Senior Center	Eureka to Ferndale	Deviated Fixed Route	Mon-Fri 8:30-10:30am 1:30-4:00pm	Disabled (18+)	2,112	\$81,943

While HCAR was the only private organization contracting directly with HCAOG, other private organizations such as the Humboldt Senior Resource Center were receiving Transit Development Act Funds through contracts with various cities.

From 1990 to 2016 HCAR remained the CTSA and received funding to provide the supplemental DAR/paratransit services in the greater Humboldt Bay area. During this same period concerns regarding the overall DAR program efficiencies, areas of service and costs came up several times.

In the Transit Development Act Performance Audit for Fiscal Years 2004 through 2007 it was recommended that HCAOG should sponsor a study to improve coordination of demand-response services and review alternative transportation options, including the consolidation of DAR and other paratransit services. In 2010 HCAOG then sponsored a consolidation study which concluded that consolidation wasn't necessarily required but that a further study was needed to standardize some administrative functions such as data reporting protocols and responsibilities for uniform service throughout the region.

In 2015 another study, the *Dial-A-Ride Contracting Review*, was conducted and made several recommendations related to consolidating DAR contracts and management, better defining the role of CTSA, and tying costs more closely to performance among other recommendations.

In 2017 HTA became the CTSA and DAR services were consolidated and contracted out to City Ambulance of Eureka. HCAOG entered into the funding agreement for DAR using STA funds. This is the agreement that continues to today.

The *Humboldt County Transit Development Plan 2023-2028*, adopted by HCAOG in October 2023, called attention to funding issues with the current allocation for the DAR program. The FY 2023-24 DAR funding agreement based on the established formula results in the following total funding allocations:

- City of Eureka (HTA) – 58 percent
- County of Humboldt – 18 percent
- HCAOG – 14 percent
- City of Arcata – 10 percent

However, the report notes that a key issue with this funding allocation is that it does not reflect that the *cost* of service varies substantially between various communities and service areas. This issue has real ramifications for overall transit services. As Eureka expends all LTF for transit purposes, any additional funds required for DAR limits Eureka's ability to fund other transit service expansions. The recommendations include a detailed evaluation of the DAR program.

Examples of Typical DAR (or Transit) Cost Allocations

In a presentation about cost allocation, the National Aging and Disability Transportation Center notes that whatever cost allocation model is used, it should be: Logical, Defensible, Consistent, and In Writing. The National Rural Transit Assistance Program (National RTAP) noted that, "Cost Allocation (is) the act of taking a sum of operating costs and distributing that sum to individual transit routes, transit services, or jurisdictions." In fact, National RTAP has a Cost Allocation Calculator that could be used to calculate and allocate the costs for HTA's DAR service (services). While not enough information has been provided to do a robust analysis herein, a couple of key points should be stressed.

The costs of a transit system can be fixed or variable. Fixed costs, such as insurance and administrative costs, typically remain the same in broad ranges of service levels. Variable costs change directly with the amount of service provided and can be tied to either the number of

hours of service provided (drivers' wages) or the mileage of the service (fuel and maintenance). In general, the:

$$\begin{aligned} & \text{Annual Cost for System or Route} = \\ & \text{Unit cost of mileage-related expenses x miles} \\ & \quad + \\ & \text{Unit cost of hours-related expenses x hours} \\ & \quad + \\ & \text{Fixed expense \% of total vehicle expenses} \end{aligned}$$

As noted above and herein, no costs are allocated based on the number of rides. This is because a “ride” can be short or long, both in terms of mileage (distance/length of the ride) and of the time of the ride. In addition, as noted herein, it is important to remember that some of the current DAR service is “required,” while much of the service is “not required,” or could be considered additional or “extra” service.

HTA DAR Information/Data

LSC Transportation Consultants, Inc. (LSC), provided an overview of the Dial-A-Ride (DAR) system in the Humboldt County Transit Development Plan (TDP) 2023 (pages 118-121). In addition, LSC highlighted where transit services and DAR services may be especially needed by analyzing census tract data through the Transit Needs Index (see Table 4, Page 11 and Figure 2, Page 13 of the TDP, also included in Appendix A of this report).

In addition to the information provided by the TDP, WTI received three months (March, April and May 2023) of DAR ridership information from HTA. This information was analyzed to determine general ridership patterns and served as a basis for how to allocate costs for the DAR service. The full analysis can be found in Appendix B, but some of the highlights of the analysis for the three-month period include the following:

- Of the 4,012 completed rides, only 26% of the hours and mileage associated with those rides remained within the same jurisdiction (a “jurisdiction” being either Arcata, Eureka or Humboldt County). That is to say that most rides, or 74%, crossed jurisdictions (jurisdictional boundaries).
- Rides within Eureka accounted for 44.84% of the total completed rides, but those rides accounted for only 22.6% of the total hours, and 14.6% of the miles.
- Rides within Arcata accounted for 5.16% of the total completed rides, 2.25% of the hours, and 1.78% of the miles.
- Rides between Arcata and Eureka (and Eureka to Arcata) accounted for 19.02% of the rides, 27.98% of the hours, and 31.68% of the miles.

When analyzing the rides and their origins and destinations, it is important to remember where the DAR service (or complementary paratransit services) needs to “legally” operate. Figure 1

shows the Arcata fixed route transit system and provides the legally required $\frac{3}{4}$ mile buffer around the fixed routes, while Figure 2 provides the same information for the Eureka fixed route service.

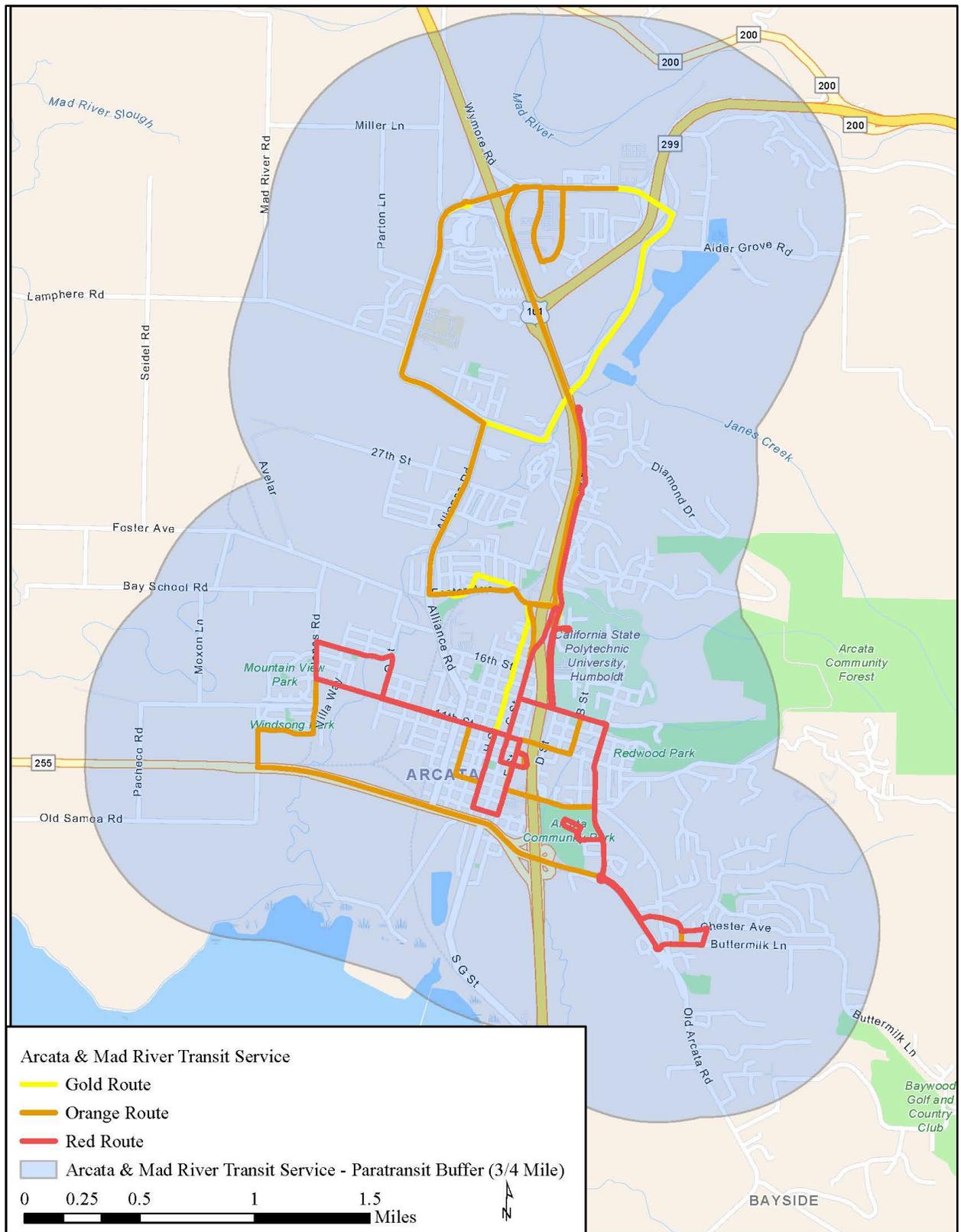


Figure 1: Required Service Area for Paratransit Service for Arcata/Mad River Transit Service

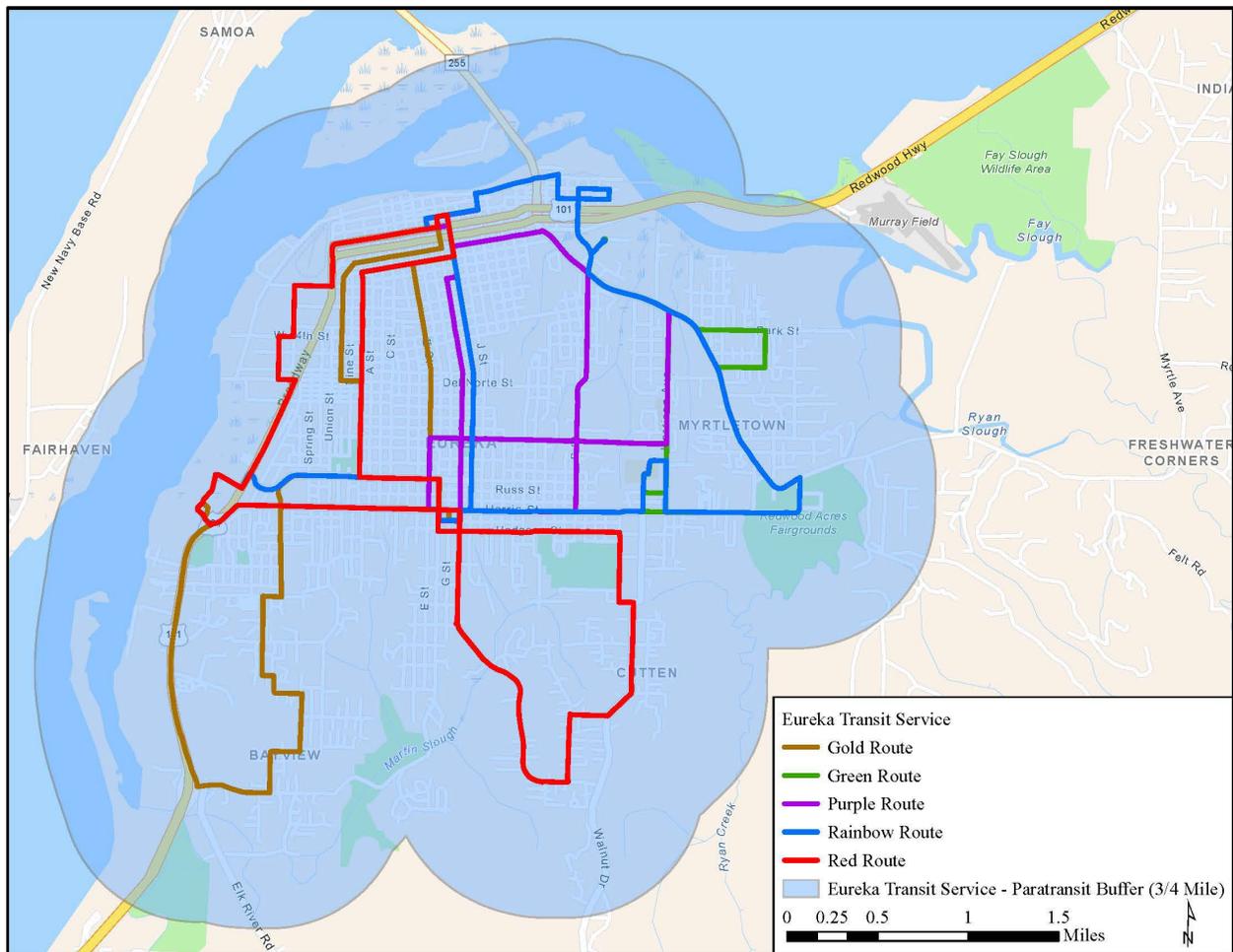


Figure 2: Required Service Areas for Paratransit Service for Eureka Transit Service

The required areas of service overlap largely with the areas (census tracts) that have the highest scores related to the Transit Needs Index (Table 1 and Table 2). The only census tracts that fall outside of the area that would be covered by the required paratransit service are two tracts in the McKinleyville area (Central McKinleyville and West McKinleyville) and two tracts in Fortuna (Fortuna/Newburg and South Fortuna). The two tracts in Fortuna would be covered by Fortuna Transit although there may be slight differences between the city limits (the boundary for Fortuna Transit) and the two noted census tracts. It is important to remember that the Transit Needs Index looks at five factors (Table 1), while required paratransit services are based/required only where a transit service’s fixed route(s) operates and the needs of persons with a disability (Table 2).

Table 1: Transit Needs Index Sorted by Overall Score

		Persons with a Disability	Senior Adults (65+)	Persons Below Poverty Level	Zero Vehicle Households	Youth (Under 18 Years)	Overall Transit Needs Index
Census Tract		Rank	Rank	Rank	Rank	Rank	Rank
5	Eureka/Old Town	5	5	5	5	5	25
3	Eureka/Rosewood	5	5	4	4	4	22
2	Eureka/Henderson Center	5	4	3	4	5	21
1	Eureka/Old Town	4	3	4	5	3	19
6	Eureka	5	4	2	2	4	17
105.03	Central McKinleyville	3	3	3	3	4	16
10.01	Arcata/Downtown	2	3	5	3	2	15
7	Eureka/Zoo	3	4	2	1	3	13
10.02	Arcata/HSU	2	1	3	4	1	11
11.02	Arcata/Alliance	2	2	4	1	2	11
11.03	Arcata	2	2	3	2	2	11
4	Eureka/Herrick Ave	3	2	2	1	2	10
109.01	Fortuna/Newburg	2	2	2	2	2	10
105.04	W. McKinleyville	2	2	2	1	2	9
110	S. Fortuna	2	2	1	1	3	9
8	Myrtle town	2	2	1	1	1	7
9	Bayside/Jacoby Creek	1	1	1	1	1	5
12	Arcata/Blue Lake	1	1	1	1	1	5
13	Arcata/Samoa	1	1	1	1	1	5
101.02	Willow Creek	1	1	1	1	1	5
102	Trinidad/Big Lagoon	1	1	1	1	1	5
103	Blue Lake	1	1	1	1	1	5
104	Clam Beach	1	1	1	1	1	5
105.02	E. McKinleyville	1	1	1	1	1	5
106	Freshwater	1	1	1	1	1	5
107.01	Humboldt Hill	1	1	1	1	1	5
107.02	Pine Hills/Fields Landing	1	1	1	1	1	5
108	Fortuna/Loleta	1	1	1	1	1	5
109.02	Fortuna/Hydesville	1	1	1	1	1	5
111	Rio Del/Scotia	1	1	1	1	1	5
112	Petrolia/Ferndale	1	1	1	1	1	5
115.01	Garberville/Redway	1	1	1	1	1	5
115.02	Shelter Cove	1	1	1	1	1	5
116	Garberville/Alderpoint	1	1	1	1	1	5
9400	Hoopa	1	1	1	1	1	5

Table 2: Transit Needs Index Sorted by Score/Rank of Persons with a Disability

		Persons with a Disability	Senior Adults (65+)	Persons Below Poverty Level	Zero Vehicle Households	Youth (Under 18 Years)	Overall Transit Needs Index
Census Tract		Rank	Rank	Rank	Rank	Rank	Rank
2	Eureka/Henderson Center	5	4	3	4	5	21
3	Eureka/Rosewood	5	5	4	4	4	22
5	Eureka/Old Town	5	5	5	5	5	25
6	Eureka	5	4	2	2	4	17
1	Eureka/Old Town	4	3	4	5	3	19
4	Eureka/Herrick Ave	3	2	2	1	2	10
7	Eureka/Zoo	3	4	2	1	3	13
105.03	Central McKinleyville	3	3	3	3	4	16
8	Myrtle town	2	2	1	1	1	7
10.01	Arcata/Downtown	2	3	5	3	2	15
10.02	Arcata/HSU	2	1	3	4	1	11
11.02	Arcata/Alliance	2	2	4	1	2	11
11.03	Arcata	2	2	3	2	2	11
105.04	W. McKinleyville	2	2	2	1	2	9
109.01	Fortuna/Newburg	2	2	2	2	2	10
110	S. Fortuna	2	2	1	1	3	9
9	Bayside/Jacoby Creek	1	1	1	1	1	5
12	Arcata/Blue Lake	1	1	1	1	1	5
13	Arcata/Samoa	1	1	1	1	1	5
101.02	Willow Creek	1	1	1	1	1	5
102	Trinidad/Big Lagoon	1	1	1	1	1	5
103	Blue Lake	1	1	1	1	1	5
104	Clam Beach	1	1	1	1	1	5
105.02	E. McKinleyville	1	1	1	1	1	5
106	Freshwater	1	1	1	1	1	5
107.01	Humboldt Hill	1	1	1	1	1	5
107.02	Pine Hills/Fields Landing	1	1	1	1	1	5
108	Fortuna/Loleta	1	1	1	1	1	5
109.02	Fortuna/Hydesville	1	1	1	1	1	5
111	Rio Dell/Scotia	1	1	1	1	1	5
112	Petrolia/Ferndale	1	1	1	1	1	5
115.01	Garberville/Redway	1	1	1	1	1	5
115.02	Shelter Cove	1	1	1	1	1	5
116	Garberville/Alderpoint	1	1	1	1	1	5
9400	Hoopa	1	1	1	1	1	5

Funding the DAR Service

As we analyze the funding of the DAR service, it is important to consider what services are required, and what services go beyond the requirements, those that could be thought of as “premium service.”

Appendix C notes the requirements for the required ADA complimentary paratransit service in Arcata and Eureka and includes information from FTA Circular 4710.1 Americans with Disabilities (ADA): Guidance. As previously discussed, the current DAR service exceeds what is required by 49 CFR Part 37, based on where it provides service. Therefore, as noted in the Circular [Chapter 8, Section 8.7 Exceeding Minimum Requirements (Premium Service)], the following are examples of services that can be viewed as a form of premium service:

- Same-day trips
- “Will-call” trips
- Trips beyond the defined service area
- Trips before or after the established service hours

Because premium services are optional under § 37.131(g) and otherwise do not fall under the complementary paratransit requirements, transit agencies may charge higher fares for premium service trips. For example, agencies may charge higher fares for trips requested on the same day of service. The exact fare for this extra service is a local decision.

FTA Circular 4710.1 also notes the rules regarding fares for paratransit services. Section 8.4.6 Fares, notes, “The fare for a trip charged to an ADA paratransit eligible user of the complementary paratransit service shall not exceed twice the fare that would be charged to an individual paying full fare (i.e., without regard to discounts) for a trip of similar length, at a similar time of day, on the entity’s fixed route system.” With the Arcata/Mad River and Eureka transit systems charging \$1.75 and \$1.70, respectively, for a ride on their fixed route services, a paratransit (or DAR) ride could be no more than \$3.50 or \$3.40 per ride. This is slightly more than the current \$3 per ride fare being charged.

It is important to remember that fare revenue typically covers a small percentage of the overall costs of a transit system, and in general, HTA has an overall farebox recovery, the percentage of overall costs covered by fares, of around 15 percent. Therefore, Federal, State, and local funds need to cover the remaining costs of the transit system.

In the Agreement Between the Humboldt Transit Authority, City of Arcata, County of Humboldt and the Humboldt County Association of Governments (HCAOG) covering FY24 (July 1, 2023 – June 30, 2024), the cost of the DAR service (a not to exceed amount of \$889,073) was divided between the City of Arcata (10.03%), Humboldt Transit Authority (57.97%), County of Humboldt (18.37%) and HCAOG (13.63%). In the Humboldt County TDP 2023 (LSC Transportation Consultants, Inc.) provided two scenarios for allocating the cost of the DAR service, which showed the allocations as noted in Table 3.

Table 3: Current and Potential DAR Cost Allocations

Total Cost Allocation	Existing Allocation	Example Scenario 1	Example Scenario 2
Eureka/HTA	58%	29%	46%
Arcata	10%	6%	12%
Humboldt County	18%	18%	15%
HCAOG	14%	47%	26%

Source: Humboldt County TDP 2023

As noted by LSC, Scenario 1 would be to simply apply the percentage of vehicle hours in each trip category. Another scenario (Scenario 2) would be to use the vehicle hour data as one factor and equally weight it with the proportion of ADA-certified passengers in each jurisdictional area.

When researching a method to allocate the costs for the service, it is important to remember that a “ride” or “trip” or an “unlinked passenger trip” does not by itself generate a significant cost, but it is a combination of the mileage and time used by that trip that creates the cost. For example, one “ride” may mean taking one person five or six blocks in one or two minutes, while another “ride” could entail taking one person 14 miles, taking 45 to 60 minutes of time. Costs for the drivers, typically the single highest operating expense for a transit system, are typically based on hours of service, while other operating costs, such as fuel and maintenance, are based on mileage. Therefore, allocating costs on a combination of hours and mileage is the way most systems allocate costs (although there can be very elaborate equations used in large systems to allocate costs).

An analysis of the completed rides from the HTA DAR service for the March – May 2023 period provides the information noted in Table 4.

Table 4: DAR Service Analysis

Origin-Destination	% of Rides	% of Miles	% of Hours	Avg % Hours/Miles
A to A	5.16%	1.78%	2.25%	2.02%
A to E	9.75%	15.77%	13.85%	14.81%
A to O	5.63%	9.25%	8.72%	8.99%
E to E	44.84%	14.60%	22.60%	18.60%
E to A	9.27%	15.91%	14.13%	15.02%
E to O	7.05%	12.80%	11.60%	12.20%
O to A	5.28%	9.13%	8.15%	8.64%
O to E	8.33%	15.36%	13.22%	14.29%
O to O	4.69%	5.40%	5.48%	5.44%

Note: “A” is Arcata, “E” is Eureka and “O” is other or Humboldt County

The service within Arcata (“A to A”) constitutes just over 2 percent of the hours and miles of the total, and service within Eureka (“E to E”) is approximately 18.6 percent of the hours and mileage of the DAR total. These two “required” paratransit/DAR services account for 50 percent of the DAR rides (complete rides), yet account for only 20.6 percent of the hours and mileage of the DAR service. Putting it another way, nearly 80 percent of the expenses of the DAR service

are for “extra” or “non-required” services. Of note is that the service between Arcata and Eureka, which is not required, accounts for 19 percent of the ridership and 30 percent of the expenses. Based on the information in Table 4, these “extra” services would be considered the hours and mileage outside of the areas required by the paratransit requirements, which constitutes 80 percent of the cost of the current DAR service. It could be argued, therefore, that Humboldt County, and/or HCAOG should fund these services.

When deciding whether HCAOG should be part of the funding mix, it is important to remember that the Humboldt County Association of Governments (HCAOG) is a Joint Powers Agency composed of the seven incorporated cities (Arcata, Blue Lake, Eureka, Ferndale, Fortuna, Rio Dell, Trinidad), and the County of Humboldt. It is the designated Regional Transportation Planning Agency (RTPA) as well as the Service Authority for Freeway Emergencies (SAFE). HCAOG’s activities carry out the policies and implement actions that the Board adopts in the Regional Transportation Plan (RTP). HCAOG’s regional transportation goal is for Humboldt County to have a carbon-neutral, multi-modal transportation system that is comprehensive, safe, sustainable, and equitable for all. The agency is largely responsible for programming specific public funds to improve local streets, roads, and state highways, as well as multi-use trails, public transportation, and active transportation amenities. The agency performs planning activities to encourage more sustainable transportation, accessible destinations, and more walkable neighborhoods.

As noted in Table 3, Scenarios 1 and 2, HCAOG funding to the DAR service would significantly increase. The source of funds that HCAOG uses to pay their share of DAR is Local Transportation Funds. These regional funds are used to partially support HCAOG operations and are a major source of transit funding. When HCAOG uses these funds for DAR, there is less to allocate to general transit operations. Therefore, unless HCAOG can access funds that would otherwise not be available to Humboldt County, HCAOG should not be involved in the funding of the DAR service, which would leave dividing up the costs between Arcata, Eureka, and Humboldt County.

Based on the potential funding scenarios noted in Table 3 and the analysis of rides noted in Table 4, a funding/cost allocation for the existing DAR service should be more like that shown in the rightmost column of Table 5 (allocating costs based on both hours and miles).

Table 5: Updated DAR Funding/Cost Allocation

Total Cost Allocation	Existing Allocation	Example Scenario 1	Example Scenario 2	Based on Hours/Miles
Eureka/HTA	58%	29%	46%	19%
Arcata	10%	6%	12%	2%
Humboldt County	18%	18%	15%	79%
HCAOG	14%	47%	26%	

Note: Example Scenarios from Humboldt County TDP 2023

While allocating the funding/costs of the DAR service based on hours and mileage would be a departure from how the costs have been allocated in the past, it highlights the fact that most of the costs associated with the DAR service are for rides/services that go beyond what is required by law (regulations). Table 5 also highlights the fact that Eureka (the City of Eureka) is currently paying more than what may be considered its “fair share” based on hours and miles, and that this likely detracts from their overall Eureka Transit Service (ETS) fixed-route service. Because so much of Eureka’s budget goes to DAR, it may be difficult for them to meet ongoing unmet needs, which include running later into the evening/night, and increasing frequency/reducing headways on the fixed-route service.

Conclusions and Recommendations

Based on the information received and analyzed, it is apparent that Humbolt Transit Authority’s (HTA’s) Dial-A-Ride (DAR) service goes above and beyond what is required by law of a complementary paratransit service. Primarily, the DAR service goes farther into areas (into the county and unincorporated areas) than is required.

In reviewing information from the recent Transit Development Plan (TDP) it would appear that limiting the DAR service to the required areas would address the needs of the majority of people with disabilities as highlighted in Tables 1 and 2, and Figure 3 (Appendix A). However, limiting the service may cause issues for those with disabilities in the McKinleyville area. Providing DAR services beyond what is required does lead to additional expenses, with roughly 79% of the expenses (hours and mileage) being spent on non-required service.

As noted in the analysis of DAR ridership for the months of March – May 2023 (details in Appendix B), roughly 50 percent of the rides occur within the areas where DAR (or paratransit) services occur (within Arcata or Eureka), but those rides account for only approximately 21 percent of the expenses (the hours and mileage of the DAR service). Therefore, the costs of the DAR service and how those costs are shared among the various jurisdictions/governmental entities should be reevaluated, and the distribution/sharing of the expenses should be based on the hours and mileage associated with the service, and not on the number of rides provided, nor population of persons with a disability within the jurisdiction.

While the analysis was based on only three months of data, if the patterns noted are indicative of annual travel patterns, roughly 80 percent of the cost of the DAR service is spent on rides (or on service to areas) that are not required by law/regulation. As noted, these “premium services” could continue to be provided, but with a higher fare for those who choose to ride on those non-required services. It is noted, however, that many of the people who rely on DAR services are likely to be on a fixed or limited income, thus an increase in fares may provide a challenge. It would need to be decided if the various jurisdictions wanted the customers/riders to pay the increased fare for the “premium service” or would want to subsidize the fare for the premium or “non-required” service.

Further, while this analysis did not investigate the performance of the contractor currently providing the DAR service, the analysis noted that the current performance of just over three rides per hour is just above the contract minimum. Therefore, an analysis should be conducted to

determine whether the efficiency of the DAR service could be improved by bringing the services “in house,” provided by HTA, or contracted to another provider.

Finally, while this effort was not meant to be an extensive review of the DAR operations, nor any of HTA’s fixed-route operations, this limited analysis highlights a few key points:

- Providing supplemental DAR services beyond those legally required is creating cost imbalances between jurisdictions and emphasizes the fact that 80% of DAR costs are generated by non-required services. This limits resources for improving general transit services.
- Continuing DAR services at the current levels and with the current fare structure is likely not fiscally sustainable.
- HCAOG should be removed from DAR contributions consistent with how DAR operate in other regions.
- A working group should be convened to make recommendations on how to best align services and financial resources. The working group would advise on:
 - The costs of the DAR service and how those costs are shared among the various jurisdictions/governmental entities. The distribution/sharing of the expenses should be based on the hours and mileage associated with the service, and not on the number of rides provided, nor population of persons with a disability within the jurisdiction.
 - If non-required supplemental services should be provided.
 - If so, should premium rates be applied?
 - Are there other more cost-effective ways that individuals in premium service areas can access transportation other than DAR?

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Appendices

Appendix A – Information from Humboldt County TDP 2023

Appendix B – WTI Analysis of HTA DAR Ridership Data

Appendix C – Information from 49 CFR Part 37

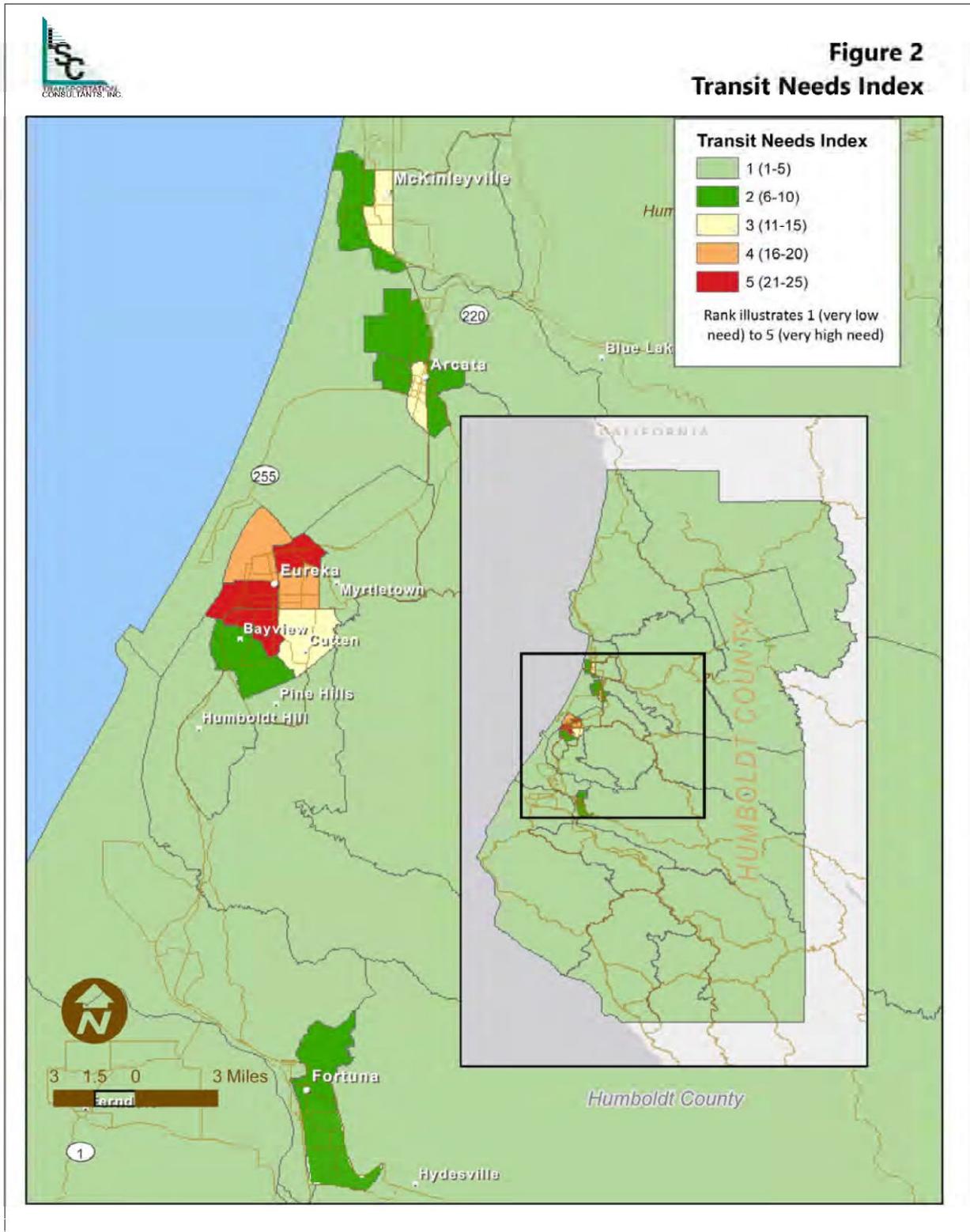


Figure 3: Transit Needs Index Figure from 2023 Transit development Plan (LSC)

Table 3: Humboldt County Demographic Characteristics

Census Tract	Area Description	Total Persons	Total Households	Youth (Under 18 Years)		Seniors (65+)		Persons with a Disability		Persons Below Poverty Level		Zero-Vehicle Households	
				#	%	#	%	#	%	#	%	#	%
1	Eureka / Old Town	4,337	1,957	670	2.6%	540	2.2%	902	4.0%	1,397	5.3%	396	10.1%
2	Eureka / Henderson Center	5,981	2,443	1,223	4.7%	693	2.9%	1,005	4.4%	661	2.5%	269	6.9%
3	Eureka / Rosewood	5,097	2,370	951	3.7%	996	4.1%	906	4.0%	1,037	4.0%	215	5.5%
4	Eureka / Herrick Ave	4,245	1,514	888	3.4%	770	3.2%	970	4.3%	1,017	3.9%	139	3.6%
5	Eureka / Old Town	4,361	1,716	832	3.2%	818	3.4%	742	3.3%	1,099	4.2%	270	6.9%
6	Eureka	5,253	2,041	970	3.7%	755	3.1%	1,041	4.6%	618	2.4%	139	3.6%
7	Eureka / Zoo	5,521	2,156	1,109	4.3%	1,383	5.7%	892	3.9%	679	2.6%	90	2.3%
8	Myrtle town	5,186	2,155	897	3.5%	1193	4.9%	1,117	4.9%	818	3.1%	87	2.2%
9	Bayside / Jacoby Creek	5,325	2,240	796	3.1%	1209	5.0%	504	2.2%	723	2.8%	19	0.5%
10.01	Arcata / Downtown	3,355	1,226	187	0.7%	401	1.7%	185	0.8%	997	3.8%	88	2.3%
10.02	Arcata / HSU	2,962	934	205	0.8%	213	0.9%	332	1.5%	832	3.2%	223	5.7%
11.02	Arcata / Alliance	4,496	1,950	756	2.9%	549	2.3%	604	2.7%	2,242	8.6%	99	2.5%
11.03	Arcata	2,152	784	266	1.0%	215	0.9%	249	1.1%	489	1.9%	89	2.3%
12	Arcata / Blue Lake	4,815	1,813	654	2.5%	639	2.6%	585	2.6%	1,188	4.5%	114	2.9%
13	Arcata / Samoa	1,423	627	250	1.0%	289	1.2%	291	1.3%	207	0.8%	25	0.6%
101.02	Willow Creek	2,382	917	748	2.9%	449	1.8%	465	2.0%	450	1.7%	56	1.4%
102	Trinidad / Big Lagoon	2,989	1,213	705	2.7%	623	2.6%	457	2.0%	500	1.9%	32	0.8%
103	Blue Lake	3,223	1,415	517	2.0%	740	3.0%	452	2.0%	498	1.9%	70	1.8%
104	Clam Beach	3,644	1,411	742	2.9%	611	2.5%	711	3.1%	199	0.8%	51	1.3%
105.02	E. McKinleyville	5,626	2,253	1,381	5.3%	823	3.4%	1,021	4.5%	1,013	3.9%	42	1.1%
105.03	Central McKinleyville	2,987	1,478	1,043	4.0%	534	2.2%	549	2.4%	899	3.4%	189	4.8%
105.04	W. McKinleyville	3,844	1,483	811	3.1%	700	2.9%	583	2.6%	714	2.7%	116	3.0%
106	Freshwater	1,992	769	328	1.3%	463	1.9%	254	1.1%	229	0.9%	6	0.2%
107.01	Humboldt Hill	4,644	1,704	1,159	4.5%	794	3.3%	417	1.8%	709	2.7%	33	0.8%
107.02	Pine Hills / Fields Landing	2,882	1,013	292	1.1%	593	2.4%	668	2.9%	540	2.1%	146	3.7%
108	Fortuna / Loleta	4,748	1,818	954	3.7%	661	2.7%	940	4.1%	1,176	4.5%	114	2.9%
109.01	Fortuna / Newburg	4,635	1,816	1,042	4.0%	683	2.8%	881	3.9%	868	3.3%	193	4.9%
109.02	Fortuna/Hydesville	4,096	1,643	698	2.7%	898	3.7%	683	3.0%	579	2.2%	43	1.1%
110	S. Fortuna	4,941	1,878	1,208	4.7%	898	3.7%	902	4.0%	586	2.2%	15	0.4%
111	Rio Dell/Scotia	4,405	1,909	1,034	4.0%	743	3.1%	750	3.3%	574	2.2%	96	2.5%
112	Petrolia/Ferndale	3,435	1,331	736	2.8%	928	3.8%	699	3.1%	391	1.5%	37	0.9%
115.01	Garberville/Redway	2,177	935	395	1.5%	663	2.7%	258	1.1%	122	0.5%	41	1.1%
115.02	Shelter Cove	1,120	653	0	0.0%	442	1.8%	244	1.1%	354	1.4%	20	0.5%
116	Garberville/Alderpoint	3,431	1,525	566	2.2%	709	2.9%	575	2.5%	657	2.5%	124	3.2%
9400	Hoopla	3,348	1,030	932	3.6%	669	2.8%	877	3.9%	1,148	4.4%	217	5.6%
	Total	135,058	54,120	25,945	19%	24,287	18%	22,711	17%	26,210	19%	3,903	7%

Source: US Census Bureau American Community Survey 2020-2021.

X% = (bolded) tracts with the highest percentage of population type.

Table 4: Humboldt County Transit Needs Index

Census Tract	Youth (Under 18 Years) Rank	Senior Adults (65+) Rank	Persons with a Disability Rank	Persons Below Poverty Level Rank	Zero-Vehicle Households Rank	Overall Transit Needs Index Rank
1 Eureka / Old Town	3	3	4	4	5	19
2 Eureka / Henderson Center	5	4	5	3	4	21
3 Eureka / Rosewood	4	5	5	4	4	22
4 Eureka / Herrick Ave	2	2	3	2	1	10
5 Eureka / Old Town	5	5	5	5	5	25
6 Eureka	4	4	5	2	2	17
7 Eureka / Zoo	3	4	3	2	1	13
8 Myrtle town	1	2	2	1	1	7
9 Bayside / Jacoby Creek	1	1	1	1	1	5
10.01 Arcata / Downtown	2	3	2	5	3	15
10.02 Arcata / HSU	1	1	2	3	4	11
11.02 Arcata / Alliance	2	2	2	4	1	11
11.03 Arcata	2	2	2	3	2	11
12 Arcata / Blue Lake	1	1	1	1	1	5
13 Arcata / Samoa	1	1	1	1	1	5
101.02 Willow Creek	1	1	1	1	1	5
102 Trinidad / Big Lagoon	1	1	1	1	1	5
103 Blue Lake	1	1	1	1	1	5
104 Clam Beach	1	1	1	1	1	5
105.02 E. McKinleyville	1	1	1	1	1	5
105.03 Central McKinleyville	4	3	3	3	3	16
105.04 W. McKinleyville	2	2	2	2	1	9
106 Freshwater	1	1	1	1	1	5
107.01 Humboldt Hill	1	1	1	1	1	5
107.02 Pine Hills / Fields Landing	1	1	1	1	1	5
108 Fortuna / Loleta	1	1	1	1	1	5
109.01 Fortuna / Newburg	2	2	2	2	2	10
109.02 Fortuna/Hydesville	1	1	1	1	1	5
110 S. Fortuna	3	2	2	1	1	9
111 Rio Dell/Scotia	1	1	1	1	1	5
112 Petrolia/Ferndale	1	1	1	1	1	5
115.01 Garberville/Redway	1	1	1	1	1	5
115.02 Shelter Cove	1	1	1	1	1	5
116 Garberville/Alderpoint	1	1	1	1	1	5
9400 Hoopa	1	1	1	1	1	5

Source: LSC Transportation Consultants, Inc.

Appendix B

The following comes from an analysis of the HTA DAR rides for the months of March, April, and May 2023.

Hours				
Destination	Arcata	Eureka	Others	Totals
Origin				
Arcata	28.6	175.6	110.6	314.8
Eureka	179.2	286.6	147.1	612.9
Others	103.4	167.7	69.5	340.6
Totals	311.2	629.9	327.2	1268.3
Percentage of Hours				
Destination	Arcata	Eureka	Others	Totals
Origin				
Arcata	2.25%	13.85%	8.72%	24.82%
Eureka	14.13%	22.60%	11.60%	48.32%
Others	8.15%	13.22%	5.48%	26.85%
Totals	24.54%	49.66%	25.80%	100.00%
Mileage				
Destination	Arcata	Eureka	Others	Totals
Origin				
Arcata	719.6	6381.5	3744.7	10845.8
Eureka	6439.5	5906.6	5181	17527.1
Others	3694.8	6215.4	2185.8	12096
Totals	10853.9	18503.5	11111.5	40468.9
Percentage of Mileage				
Destination	Arcata	Eureka	Others	Totals
Origin				
Arcata	1.78%	15.77%	9.25%	26.80%
Eureka	15.91%	14.60%	12.80%	43.31%
Others	9.13%	15.36%	5.40%	29.89%
Totals	26.82%	45.72%	27.46%	100.00%

Completed Rides				
Destination	Arcata	Eureka	Others	Totals
Origin				
Arcata	207	391	226	824
Eureka	372	1799	283	2454
Others	212	334	188	734
Totals	791	2524	697	4012

Percentage of Completed Rides				
Destination	Arcata	Eureka	Others	Totals
Origin				
Arcata	5.16%	9.75%	5.63%	20.54%
Eureka	9.27%	44.84%	7.05%	61.17%
Others	5.28%	8.33%	4.69%	18.30%
Totals	19.72%	62.91%	17.37%	100.00%

Cancelled Rides				
Destination	Arcata	Eureka	Others	Totals
Origin				
Arcata	72	158	122	352
Eureka	179	970	153	1302
Others	112	167	142	421
Totals	363	1295	417	2075

Percentage of Cancelled Rides				
Destination	Arcata	Eureka	Others	Totals
Origin				
Arcata	3.47%	7.61%	5.88%	16.96%
Eureka	8.63%	46.75%	7.37%	62.75%
Others	5.40%	8.05%	6.84%	20.29%
Totals	17.49%	62.41%	20.10%	100.00%

No Shows				
Destination	Arcata	Eureka	Others	Totals
Origin				
Arcata	12	13	6	31
Eureka	9	63	9	81
Others	10	8	3	21
Totals	31	84	18	133
Percentage of No Shows				
Destination	Arcata	Eureka	Others	Totals
Origin				
Arcata	9.02%	9.77%	4.51%	23.31%
Eureka	6.77%	47.37%	6.77%	60.90%
Others	7.52%	6.02%	2.26%	15.79%
Totals	23.31%	63.16%	13.53%	100.00%

Highlights from the statistics not noted in the main body of the document:

- Of all the rides originally booked, approximately 1/3 or 33.3% are canceled before the ride is scheduled to take place.
- Approximately 2% of the rides are a “no-show,” which means that the vehicle has arrived to pick up a customer/rider, but the person is not there for the ride.
- Overall, there are 3.16 rides per hour, which is just above the contract minimum of three rides per hour.

Appendix C

ADA Paratransit Requirements

49 CFR PART 37—TRANSPORTATION SERVICES FOR INDIVIDUALS WITH DISABILITIES (ADA) - Definitions

Commuter bus service means fixed route bus service, characterized by service predominantly in one direction during peak periods, limited stops, use of multi-ride tickets, and routes of extended length, usually between the central business district and outlying suburbs. Commuter bus service may also include other service, characterized by a limited route structure, limited stops, and a coordinated relationship to another mode of transportation.

Demand responsive system means any system of transporting individuals, including the provision of designated public transportation service by public entities and the provision of transportation service by private entities, including but not limited to specified public transportation service, which is not a fixed route system.

Fixed route system means a system of transporting individuals (other than by aircraft), including the provision of designated public transportation service by public entities and the provision of transportation service by private entities, including, but not limited to, specified public transportation service, on which a vehicle is operated along a prescribed route according to a fixed schedule.

Origin-to-destination service means providing service from a passenger's origin to the passenger's destination. A provider may provide ADA complementary paratransit in a curb-to-curb or door-to-door mode. When an ADA paratransit operator chooses curb-to-curb as its primary means of providing service, it must provide assistance to those passengers who need assistance beyond the curb in order to use the service unless such assistance would result in a fundamental alteration or direct threat.

Paratransit means comparable transportation service required by the ADA for individuals with disabilities who are unable to use fixed route transportation systems.

SUBPART F—PARATRANSIT As a COMPLEMENT To FIXED ROUTE SERVICE

§ 37.121 Requirement for comparable complementary paratransit service.

(a) Except as provided in paragraph (c) of this section, each public entity operating a fixed route system shall provide paratransit or other special service to individuals with disabilities that is comparable to the level of service provided to individuals without disabilities who use the fixed route system.

(b) To be deemed comparable to fixed route service, a complementary paratransit system shall meet the requirements of §§ 37.123-37.133 of this subpart. The requirement to comply with § 37.131 may be modified in accordance with the provisions of this subpart relating to undue financial burden.

(c) Requirements for complementary paratransit do not apply to commuter bus, commuter rail, or intercity rail systems.

§ 37.131 Service criteria for complementary paratransit.

The following service criteria apply to complementary paratransit required by § 37.121 of this part.

(a) Service Area —

(1) Bus.

(i) The entity shall provide complementary paratransit service to origins and destinations within corridors with a width of three-fourths of a mile on each side of each fixed route. The corridor shall include an area with a three-fourths of a mile radius at the ends of each fixed route.

(ii) Within the core service area, the entity also shall provide service to small areas not inside any of the corridors but which are surrounded by corridors.

(iii) Outside the core service area, the entity may designate corridors with widths from three-fourths of a mile up to one and one half miles on each side of a fixed route, based on local circumstances.

(iv) For purposes of this paragraph, the core service area is that area in which corridors with a width of three-fourths of a mile on each side of each fixed route merge together such that, with few and small exceptions, all origins and destinations within the area would be served.

"Premium Charges" for Paratransit Services (<https://www.transit.dot.gov/regulations-and-guidance/civil-rights-ada/premium-charges-paratransit-services>)

Is a transit operator permitted to establish "premium charges" for complementary paratransit services that exceed the minimum requirements established by the Department of Transportation's ADA regulations?

In general, any paratransit services that a transit operator provides above and beyond its regulatory obligations, including service to individuals who do not fall under one of the three categories of eligibility established under the ADA, are not subject to the service criteria for ADA complementary paratransit (i.e., service area, response time, fares, trip purpose, hours and days, and capacity constraints). Transit operators may therefore elect to establish "premium charges" for such services.

Under the ADA, paratransit functions as a "safety net" for people with disabilities who are unable to make use of the fixed-route – e.g. "mainstream" – transit system (bus or rail). It is not intended to be a comprehensive system of transportation that meets all of the travel needs of persons with disabilities. As such, the level of service is required to be comparable to the fixed-route system, and service is required only for individuals whose disability – permanent or temporary – prevents them from using the fixed-route system. The eligibility requirements are

incorporated into §37.123 of the Department's regulations, and the service criteria are established by §37.131.

Section 37.131 establishes the minimum requirements for complementary paratransit provided under the ADA; transit operators are free to provide any level of additional service that they or their communities find necessary. This could include providing paratransit service to individuals who do not meet the eligibility criteria, operating paratransit service beyond the fixed-route service area, providing service when the fixed-route system is not running, or by exceeding the basic next-day service requirement. In such cases, the operator would not be bound by the service criteria for ADA complementary paratransit, including the requirement that limits the fare to no more than twice the fare for a comparable trip on the fixed-route system.

While "premium charges" would therefore be permitted for such services, transit operators who wish to do so are strongly advised to thoroughly review Subpart F of the Department's ADA implementing regulations before making any changes to the operations, eligibility, or fare structure of their existing ADA complementary paratransit systems. Not only must transit operators ensure that any proposed changes are consistent with the basic ADA requirements, but they must also meet the applicable public participation requirements.

With regard to public participation, §37.137(c) requires a paratransit operator to create an "ongoing mechanism" for the participation of individuals with disabilities in the continued development and assessment of services to persons with disabilities. While this provision does not require a transit operator to conduct a public hearing for minor adjustments to its ADA paratransit service, the use of some form of public participation process in the establishment of "premium services" is strongly advised.

A public hearing is required, however, for changes to the paratransit reservations system. Under §37.131(b)(4), any changes to the reservation system must comply with the public participation requirements in §§37.137(b) and (c) of the Department's ADA implementing regulations.* These require that public participation include: outreach, consultation with individuals with disabilities, opportunity for public comment, a public hearing and the creation of a mechanism for continued participation of persons with disabilities in the development and assessment of services to persons with disabilities.

Transit operators are also advised that they must still meet the basic ADA paratransit service criteria, and should avoid any practice by which eligible riders are "steered" into a service category to which "premium charges" are applied. Furthermore, transit operators should not look to "premium services" as a means of relieving demand for ADA complementary paratransit services by eligible riders.

*Note: §37.131(b)(4) of the Department's ADA regulations, as amended, contains a typographical error; reference to §37.131(b) and (c) should read "37.137 (b) and (c)."

Last updated: Thursday, February 27, 2020

Note: Additional information on paratransit services can be found in