Expanding Transportation Choices in the Grand Traverse Region Connecting Villages and Towns with Public Transit

OCTOBER 2009



The Grand Vision recognized the importance of improving public transportation services between towns and cities. Fixed-route bus service will increase bus ridership throughout the Grand Traverse region. Providing commuters with fast, efficient, reliable transportation.



This report was prepared as part of the Institute's
Thriving Communities program, which is building prosperous communities
through good governance and community designs that put people first.



Jim Lively, the Institute's Program Director, provided guidance and direction for this report. 231-941-6584, jim@mlui.org



Hannah Clark conducted the research and interviews, rode hundreds of miles on buses, and was the primary author of this report. Hannah's enthusiasm for improving our regional transit system and knowledge of fixed-route service was invaluable.



148 East Front St., Suite 301 Traverse City, MI 49684 **mlui.org** 231-941-6584

Bold Solutions for Michigan's People and Places

The **Michigan Land Use Institute** is a supporter and partner of the regional **Grand Vision** for Antrim,

Benzie, Grand Traverse, Kalkaska, Leelanau and Wexford Counties (see **thegrandvision.org**). This report is an independent effort of the Institute to advance implementation of a key priority of the Grand Vision Transportation working group, but is not intended as a statement of or by the Grand Vision itself.

Funded by Rotary Charities of Traverse City

Expanding Transportation Choices in the Grand Traverse Region Connecting Villages and Towns with Public Transit

October 2009

EXECUTIVE SUMMARY		p. 2
I. Introduction	N: WHY FIXED ROUTES?	p. 2
	LIC TRANSIT SERVICES IN	
the Grand Traverse Region		p. 3
Public Trans	it in the Region	p. 5
Transit Ager	ncy Characteristics	p. 6
Trends in Fi	xed Route Ridership	p. 6
Public Transit Service Definitions		p. 7
BATA Villaş	ge Connector Ridership	p. 8
Zone versus	Village Connector	p. 10
III. TRANSIT BEST PRACTICES		p. 12
Transit First		p. 12
Transit Oriented Development (TOD)		p. 12
Bus Rapid Transit		p. 12
Fixed Routes in Other Rural Regions		p. 13
Innovative T	Fransit Solutions	p. 14
IV. How Do BAT	'A'S VILLAGE CONNECTORS	
Work for Commuters?		p. 15
Deciding to	ride the bus	p. 15
How they ride		p. 16
Where they ride		p. 20
Why they ri	de	p. 20
V. STRATEGIES FO	OR EXPANDING RIDERSHIP	p. 21

EXECUTIVE SUMMARY

Effective public transportation connecting towns and cities is a vital part of a growth strategy for future prosperity in the Grand Traverse Region. The Grand Vision process highlighted the public's support for increased investments in public transportation. Currently the public transit services provided in the region target riders with no other transportation options. Commuters are the largest potential market for increasing bus ridership, and evidence suggests commuters will only use fixed route bus service that offers a fast, efficient, reliable transportation choice. This report examines how commuters use existing fixed routes in the region and offers insight into how to effectively increase and improve public transit services.

I. Introduction

Over the past two years, 15,000 residents of the six-county Grand Traverse Region came together to answer an important question: What is our vision for the region's future? This is a critical question because the region's unique scenic beauty, natural resources, and vibrant communities ensure that people will continue to choose to live here. In the past decade the Grand Traverse Region has experienced 26 percent growth, making it part of the fastest growing region in the Midwest.¹ Growth will happen, and through the Grand Vision process, residents of Antrim, Benzie, Leelanau, Grand Traverse, Wexford and Kalkaska Counties are participating in a long term planning effort to guide the region's growth and pathway to prosperity.

The public agrees: One of the keys to prosperous regional growth is investment in transportation choices. So the Grand Vision emphasizes growth in existing investment areas—our villages, towns, and cities—linked by smart transportation options. New transportation projects must be designed to maintain and improve the existing road system, invest in better infrastructure for bicyclists and pedestrians, and most importantly for this report, increase public transportation services linking towns and cities in the region.

Public transit is essential for the many people who cannot drive or do not have access to a car. The existing transit systems in the region are primarily dial-a-ride service for people who have few other transportation choices. While this door-to-door "demand response" service is convenient, it does not arrive on a schedule, takes much longer than it would to drive a car, and requires scheduling and waiting. In order to achieve a truly effective regional transportation system that connects people, jobs, and communities, transit must be re-designed to meet the needs of people who choose to ride the bus. The largest potential group of these "riders by choice" is the same group that is currently on the road in single-occupancy vehicles in the largest numbers: commuters.

Commuters will ride a transit system that is fast, reliable, efficient, and runs on a regular schedule with convenient stops. Transit agencies need to emphasize fixed routes over demand response service to attract riders by choice. By creating a system that works for more riders, agencies will create a system that has more community support and works better for all riders.

¹ "About the Project." The Grand Vision. 10 June 2009 http://www.thegrandvision.org/about/>.

John Fregonese, a Grand Vision consultant, sees a great opportunity for building a model rural transit system in the region. "In developing the Grand Vision, the public was very clear in their support for a modern, efficient transit system that connects people in cities and villages across the region," said Fregonese. "If there is one regional public investment that can most directly influence future growth patterns, I think it will be an investment in a coordinated, efficient public transit system. And I believe that the Grand Traverse region is perfectly positioned to get this done."



Over a two-year period, 15,000 people participtated in planning the Grand Traverse Region's future development.

One doesn't have to look far from home to find a working example of a rural fixed route. The Bay Area Transportation Authority, (BATA), operates the in-town fixed Cherriot route in Traverse City and three fixed Village Connector routes in rural Leelanau and Grand Traverse Counties.² A large number of those using BATA's Village Connector routes are commuters, most traveling to work in Traverse City. This report examines the experiences, challenges, and creative ways these riders use the Village Connector buses to provide insight into how regional public transit services could expand and improve.

II. Existing Public Transit Services in Grand Traverse Region

Currently, five transit agencies provide service in the six counties that comprise the Grand Traverse Region. In the past, these agencies primarily operated independently from one another, with little regional cooperation. All agencies, excluding Antrim County Transit Authority, receive a large amount of funding from county millages, reinforcing the county line as a strict service boundary.

All transit agencies in the six-county region operate demand-response service or dial-a-ride. This type of service is also referred to as paratransit, and the Americans with Disabilities Act (ADA) requires that all public transit agencies provide services for people with disabilities that is comparable to the level of service provided to people without disabilities using the system.³ In short, a transit agency cannot operate a fixed route bus system without also operating an ADA-approved paratransit system as well.

² "About the Project." The Grand Vision. 10 June 2009 http://www.thegrandvision.org/about/>.

³ Bay Area Transportation Authority, http://www.bata.net

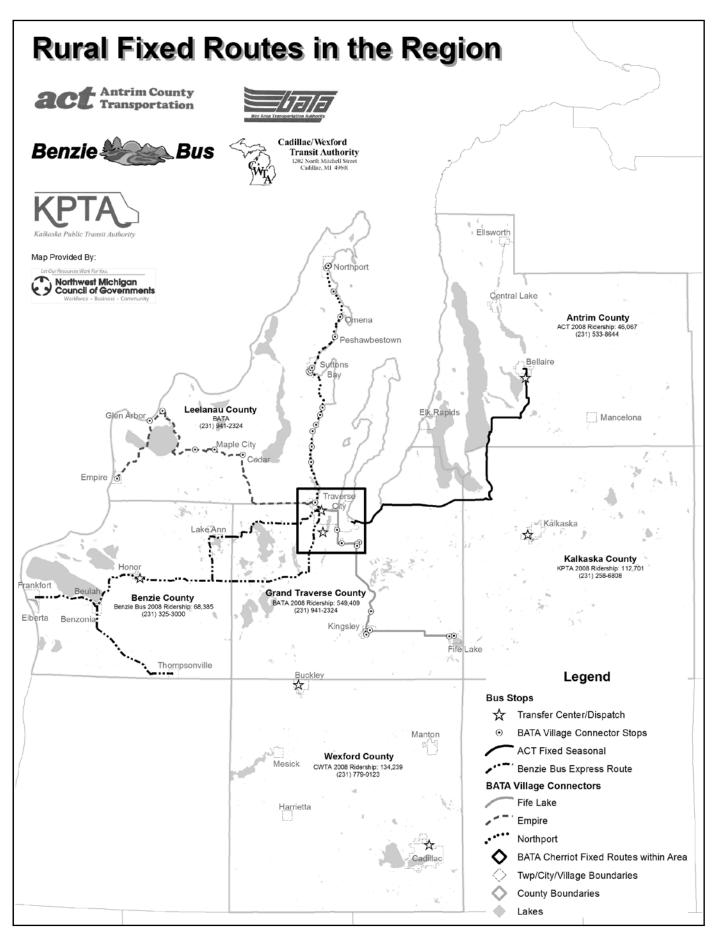
Even though ADA regulations only require agencies to provide paratransit to those riders who have a documented disability that prevents them from using a fixed route, all of the region's transit agencies have chosen to provide demand-response service to all riders. This business decision is apparently due to a perceived lack of public demand from commuters for fixed routes, and therefore the agencies operate according to missions that focus primarily on the disabled, elderly, and those unable to drive.

The Cadillac/Wexford Transit Authority offers, in its own words, "a county-wide demand-response system." The Kalkaska Public Transit Authority and Antrim Public Transit Authority, too, offer demand-response service throughout the county. Kalkaska County is also home to a flex route, which operates in lieu of a school bus system. Flex route buses operate on a schedule with short deviations from a fixed route. KPTA is one of many agencies in the country that are reducing costs and increasing efficiency by combining bus services for students and the general public. To date, however, few members of the general public take advantage of this route.

In addition to demand-response service, Benzie Bus operates an express route that travels along the main highway connecting the county's village centers—a normal route to Traverse City with timed stops. Benzie Bus' service is innovative in that local demand-response buses act as feeders to the regular express route, reducing costs and shortening trip times. Although these services function with the regularity of a fixed route, Benzie Bus requires call-in reservations to ride.

Currently, only the Bay Area Transportation Authority (BATA), which covers Grand Traverse and Leelanau Counties, operates a true fixed-route bus system. The Cherriot Bus system began operation in 2000 with four in-town fixed routes in Traverse City. Later, in 2006, BATA began operating three rural fixed-routes, called Village Connectors, in outlying areas of Grand Traverse and Leelanau Counties. Both fixed route systems pick up passengers at regular, scheduled stops along a fixed route of travel. The Village Connector buses, unlike the in-town Cherriot, will honor flag stops—stopping anywhere along the route when a passenger flags down the bus.

⁴"Local Bus Service." Rail and Public Transit. Michigan Department of Transportation. 26 Aug 2009 http://www.michigan.gov/mdot/0,1607,7-151-9615_29684_29686-174505--,00.html>



BATA provides extensive demand-response service to any person that calls for a ride. BATA demand response service is broken into 13 geographical "zones." Zone buses are regulated through a dispatch system. Riders reserve a place on the bus, at a certain time, and BATA dispatches a bus in the appropriate zone to pick up a rider at the door and drop them at a pre-designated destination. Despite the convenience of cab-like service, riders on a schedule cannot use demand response buses effectively, as trip time is determined by the stops a bus must make.

Transit Agency Characteristics⁵

Antrim County:

Antrim Public Transit Authority Al Meacham, Director 231-533-8644 www.antrimcounty.org/act.asp

Days/Hours of Operations: M-F 6:00 a.m. - 6:00 p.m. Total vehicles: 15

Lift-equipped vehicles: 14 Population Served: 23,110

Employees: 14 Miles: 279,791 Vehicle Hours: 11,537 Passengers: 46,067

Benzie County:

Benzie Bus

Susan Miller, Executive Director

231-325-3000

www.benziebus.com Days/Hours of Operations: M-F 6:00 a.m. - 10:00 p.m. SAT 7:00 a.m. - 6:00 p.m.

Total vehicles: 15 Population Served: 16,000

Employees: 32 Miles: 729,071 Passengers: 68,385

Kalkaska County:

Kalkaska Public Transit Authority Ron Kea, Coordinator 231-258-6808

Days/Hours of Operations: M-F 6:30 a.m. - 6:30 p.m.

Total vehicles: 21

Population Served: 16,000

Employees: 17 Miles: 190,758 Passengers: 112,701

Grand Traverse/Leelanau Counties:

Bay Area Transportation Authority (BATA)

Tom Menzel, Executive Director

231-941-2324 www.bata.net

Days/Hours of Operations: M-S 6:00 a.m. - 12:30 p.m. SUN 7:30 a.m. - 12:30 p.m.

Total vehicles: 58

Lift-equipped vehicles: 57 Population Served: 98,773

Employees: 90 Miles: 2,027,580 Vehicle Hours: 131,725 Passengers: 549,409

Wexford County:

Cadillac/Wexford Transit Authority Vance Edwards, Manager

231-775-9411

Days/Hours of Operations: M-F 5:00 a.m. - 6:00 p.m. SAT 10:00 a.m - 4:00 p.m Total vehicles: 20

Lift-equipped vehicles: 20 Population Served: 31,876

Employees: 44 Miles: 530,250 Vehicle Hours: 33,621 Passengers: 134,239

Trends in Rural Fixed-Route Ridership (Village Connectors)

Currently, when the public thinks of transit outside of Traverse City, they primarily think of demand-response "dial-a-ride" service or BATA "Zone" buses. Zone service has been the transit agency's main service for years. But for the past three years BATA has offered three fixed route Village Connector routes in some of the same areas that it provides Zone service. These overlapping services are inefficient and cost ineffective, but BATA felt it necessary because of the public expectation for door-to-door Zone service.

⁵ Ibid.

Public Transit Service Definitions

Public transit services in the region can take many forms:

Fixed route: Transit services that operate along a prescribed route according to a fixed schedule. Four regular fixed routes operate in the Greater Grand Traverse Region; two additional routes exhibit some characteristics of a fixed route.

Demand Response: Transit services, usually by a car, van, or small bus, that pick- up and drop-off riders at their destination. Demand response is called "Zone" service by some agencies. Demand response services may include:

ADA Paratransit: Transportation services for people with disabilities who are not able to use fixed-route service.

Dial-A-Ride: Prescheduled door-to-door pick up and drop off service.

Specialized Services: Transit services that serve certain need groups, such as medical riders, students, or the disabled. These services are customarily the result of a partnership between transit agencies and human services organizations.

There is virtually no marketing or promotion of the Village Connectors, and in most cases the bus stops in the villages are not marked. Where there are bus stop signs or shelters, the bus schedule is typically not posted. When people in rural areas call BATA dispatch for a ride, they are typically scheduled for Zone Bus instead of being advised to ride the fixed route, even if they live very near a Village Connector route or a regular stop.

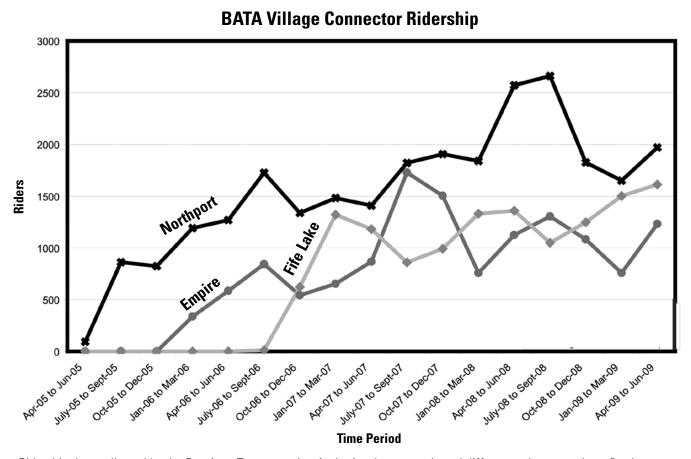
With such little awareness of the Village Connector service it is no surprise that ridership numbers are higher on BATA's Zone buses than on the Village Connectors. But ridership on the BATA's three fixed rural routes has grown since their inception; many regular riders and commuters find that fixed routes are easier to use and more convenient than demandresponse. This increase has neither been steady nor uniform—ridership rises and falls with the season, growth rates differ among years, and trends on each route vary. This section attempts to offer an explanation for data trends and variations.

There is not much data to analyze. "With these low levels of ridership, one person can make a difference," BATA Operations Director Don Scharmen explains. The total number of riders on the Empire Village Connector in 2008, for example, totaled 4,269. One commuter riding back and forth from work each day, five days a week throughout the year, could account for 250 "riders"—if that worker stopped riding the bus altogether, ridership would drop almost 6 percent.

Another problem with analyzing ridership on the Village Connectors, says Scharmen, is that BATA drivers do not enter riders into a computerized system, but rather mark a paper tally sheet. In contrast, when a person calls BATA dispatch for Zone bus service their name, home address, and the location to which they are traveling is entered into a computerized database.

However, some trends do emerge from these tally marks. These trends can start to inform us as to why some routes do better than others, and what conditions make for an attractive fixed-route.

The major, most predictable trend came in the summer of 2008. Bus drivers on all routes reported an increase in riders during the now-iconic period of four dollar a gallon gas. During this period people ditched their cars and turned to the more attractive and less expensive option. Total Village Connector ridership was at an all time high, with 5,055 riders from April to June 2008 and 5,015 from July to September. Gas prices dropped below \$2 in the winter of 2008 and ridership fell more than 70%.



Ridership data collected by the Bay Area Transportation Authority shows trends and differences between three fixed routes running in different areas of Leelanau and Grand Traverse Counties.

Of the three routes, the Northport Connector reports the highest ridership. Northport's highest ridership—2,661 riders from July to September of 2008—is about a third higher than the highest reported ridership on either the Empire or Fife Lake route. Ridership on the Northport Village Connector has even eclipsed Zone bus ridership, which has tended to be much higher than on the fixed routes. According to some bus riders and drivers, this may be because the Northport route is faster and easier to use. The route runs along one state highway, M-22, up and down a narrow peninsula. This means that more people live close to a bus stop.

The success of the Northport Village Connector demonstrates the importance of population density for bus ridership. Villages and towns along the Northport route—including Suttons Bay, Omena, and Northport—boast a high population density compared to the rest of the county. More people living close together in towns and village centers make it easier for BATA to connect the places where people live and work.

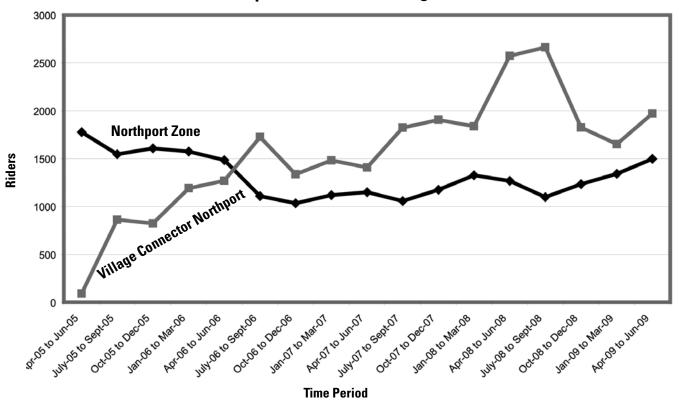
CONNECTING VILLAGES AND TOWNS WITH PUBLIC TRANSIT

Generally, the number of riders using a fixed route follows a seasonal pattern. These trends, however, differ between the three Village Connector routes. On the Empire and Northport Village Connectors ridership tends to peak during summer months and drop during the winter. Ridership on the Fife Lake Village Connector follows the opposite pattern, peaking in the cold winter months and dropping in the summer.

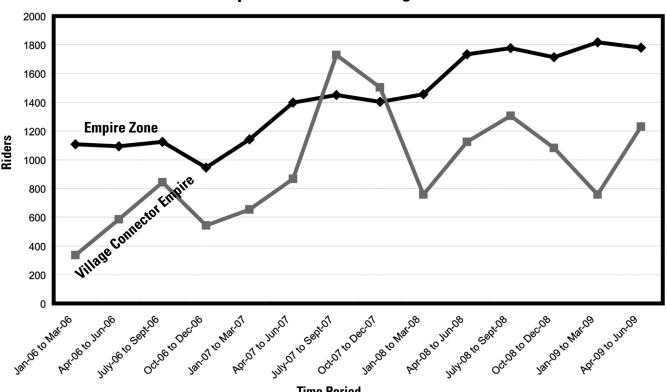
County differences may offer an explanation to these trends, says BATA's Scharmen: "On the Fife Lake route, in the winter months, there are some students coming in from Kingsley." Because BATA runs from Fife Lake through Kingsley to Traverse City—all within Grand Traverse County—the number of students using the bus seems to be larger than on the routes that run from neighboring Leelanau County.

The larger tourism industry in Leelanau County may also account for higher numbers of summer riders on the two routes in that county. Dave Noble, a driver on the Northport Village Connector and a former Leland harbor master, suggests that seasonal changes in ridership result from tourism. "There are just more people here in the summer. We end up with a lot of boaters from the marina; they don't have cars. It's a scenic route; some people just hop on to go to Northport for the day," Dave explains. Rene, another driver on the route, concurs that ridership picks up in the summertime. Along with boaters, says Rene, "A lot of people ride out to the casino, too."

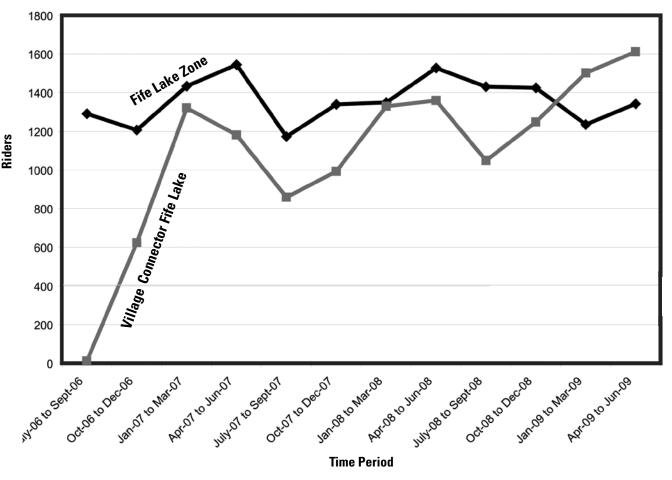
Northport Zone versus Village Connector



Empire Zone versus Village Connector



Fife Lake Zone versus Village Connector



Ridership increases on Village Connectors in comparison to BATA Zone buses suggest that more people are finding their way onto fixed routes despite the lack of promotion.

III. BEST TRANSIT PRACTICES

Regions around the country are tackling the challenge of offering the best transit services to their residents in many different ways: express bus, bus rapid transit (BRT), light rail, urban streetcars, commuter rail, local bus, vanpool, paratransit, and community circulators, to name a few. Use of these techniques varies according to the unique characteristics of an area. To implement the Grand Vision, the Grand Traverse Region must design transit services that work effectively in a rural region with village-centered growth. This section explores "best practices" and techniques to help guide the region to enhance and improve our transit systems.

Transit First

Regions across the country that value economic prosperity and sustainability, environmental protection, and livability prioritize these values through policies generally described as "Transit First." Transit First is a set of policies or documented preferences that prioritize transit over private automobiles in land use and transportation planning. Decision-making bodies make transit and non-motorized travel more attractive to commuters through such policy initiatives, indexing financial incentives, planning guidelines, and improvements in infrastructure. Because non-motorized transportation options are essential to functioning transit systems (people bike or walk to and from transit stops), transit-first policies promote investments in sidewalks, streetlights, bike paths, bike racks, and other forms of transportation over additional investments in the private automobile.⁶

Transit Oriented Development (TOD)

Transit Oriented Development is a planning concept that recognizes that private investment will follow public investment in transit. In large urban areas with light-rail transit, property within a 10 minute walk of a subway station becomes much more valuable for residential and commercial development. Planners promote TOD to maximize the convenience of transit through higher density and mixed-use clusters of development nearby transit stops. In a rural village connector system, public investments in well-marked and visible bus stops in villages signify to nearby property owners that they can expect more commuter traffic. Village zoning that recognizes the value of higher density development near transit stops provides residents with the residential and transportation choices they identified in the Grand Vision.

Bus Rapid Transit

Bus rapid transit (BRT) is a combination strategy designed to provide faster, more efficient and high capacity bus service at lower cost than light or commuter rail. BRT techniques may include frequent service, automated pre-paid fares, platform levels equal to bus floor heights, designated bus lanes with exclusive right of way, and bus priority at signals.

⁶ San Francisco Municipal Charter 1996 SEC. 8A.115. TRANSIT-FIRST POLICY. http://www.municode.com/Resources/gateway.asp?pid=14130&sid=5

Bus rapid transit is a combination of techniques, not a rigidly defined system. Very few systems operate with all of these characteristics—like the first BRT system, in Curitiba, Brazil and the Orange Line in Los Angeles—but all strategies are designed to improve the quality and speed of bus services. The National Bus Rapid Transit Institute offers a full description of BRT, plus ways to build, fund, promote, and evaluate BRT systems.⁷



The Rede Integrada de Transporte in Curitiba, Brazil was the first BRT system in the world.

Fixed Routes in Other Rural Regions

While rural transit systems can learn from and adopt some strategies used in metropolitan areas, like BRT and transit-oriented development, lower population density and car-oriented infrastructure in rural areas present unique challenges. The Grand Traverse Region is a mix of semi-urban and rural spaces that experience a high amount of commuter traffic between outlying villages and the Traverse City city-center. While the area may be rural, there is an urban need for increased commuter options.

Several rural and micropolitan areas in the United States offer insight into effective "best practices" to guide the region's transit development. Most importantly, these regions focus on fixed-route service, with some deviation, to provide fast, convenient, and reliable transportation options.

Berkshire Regional Transit Authority

Berkshire Regional Transit Authority operates eight fixed routes, which connect rural towns and villages in Berkshire County, Massachusetts. The agency enjoys a high level of ridership from commuters, students, the elderly, and people with disabilities. BRTA achieves this in part by focusing resources and promotion on the agency's fixed routes. In order to use demand-response paratransit services, riders who are unable to use the regular bus routes must file an application with BRTA. The application remains on file for four years, in which time the paratransit user is entitled to door-to-door service at half fare. This system reduces BRTA's spending on costly demand-response services, and allows them to offer more fixed routes and promotion.⁸

OmniLink, Prince William County, Virginia

OmniLink uses a unique flex route to balance the bus service's speed and reliability with the challenge of serving individuals who are unable to reach bus stops. OmniLink operates along a

⁷ National Bus Rapid Transit Institute, http://www.nbrti.org

Berkshire Regional Transit Authority, Special Services for the Mobility Disabled, http://www.berkshirerta.com/paratransit.php

designated route with established bus stops, but with advance notice buses can deviate to locations up to ¾ mile off the route. Off-route trips are allowed only when the deviation does not disrupt the bus's reliability for other customers. Onboard technology calculates the most efficient route.⁹

Community Transit Network, Boulder, CO

Boulder, Colorado's GO Boulder initiative has set an ambitious goal of moving 19 percent of commuters from private automobiles to alternative transportation. Buses are an integral piece of the initiative. The Community Transit Network offers six community fixed routes. Each route is colorfully branded to fit the community it serves. Buses run regularly and frequently—every 10 to 15 minutes during rush hour and 25 to 30 minutes midday and evenings. The Community Transit Network owes its success in part to Boulder's Transit Master Plan, which guides transportation and community planning to reach the city's transportation goals.¹⁰

Innovative Transit Solutions

Communities around the nation are devising innovative solutions to providing quality transportation services that offer alternatives to commuters driving in single-occupancy vehicles. Many of these solutions are very successful at attracting riders. Here are a few examples:

■ Commuter Vanpools

Public vanpooling is quickly becoming a popular way to get to work, especially for people with long commutes. A vanpool is a group of seven to 15 people who travel to and from work together and share the costs of operating the van. A licensed public vanpool provider owns the van and pays for insurance and maintenance. The volunteer driver/ commuter usually rides for free.

In low-density rural areas vanpools can offer a more cost-effective alternative than providing numerous fixed routes because of the cost saving from not hiring drivers. VPSI, one of the largest national vanpool operators, provides more information about the benefits of vanpooling and getting your own started.¹¹

■ Commuter Tax Benefits

The federal government provides important tax benefits for commuters who use transit or carpooling to get to work. A Commuter Choice tax benefit allows up to \$230 per month to be used for commuting, tax free. The employee can pay for the cost of commuting (such as using the bus or vanpooling) through pre-tax payroll deduction, the employer can pick up the expense, or both the employee and employer can share in the expense. Under all three scenarios, both the employee

⁹ Potomac and Rappahannock Transportation Commission, Omnilink, http://www.prtctransit.org/local-bus/index.php

¹⁰ Go Boulder, Community Transit Network, http://www.bouldercolorado.gov/index.php?option=com_content&view=article&id=8939&Item id=2975

¹¹ VSPI, http://vanride.org

and employer can gain significant tax advantages.¹² Under the 2009 update to the law, bicyclists can receive up to \$20 per month commuting reimbursement.¹³

■ Slug Lines

Slug lines are Washington, D.C.'s unique solution to commuting problems. Slugging, sometimes referred to as casual carpooling or organized hitchhiking, is a system of pick-up and drop-off points where drivers pick up riders in a queue who are going to the same destination. The drivers and riders, usually strangers, form a mutually beneficial relationship: drivers fulfill the minimum three-passenger limit to travel in the faster High Occupancy Vehicle lane, and passengers get a ride.¹⁴

■ Car Sharing

For people who use public transportation but need a car every once in a while, car-sharing programs work quite well. Drivers share the cost of owning and maintaining a private vehicle or enroll in a commercial car-sharing program. Nonprofit car-sharing programs are popping up all over the country. For-profit car-sharing companies like Zipcar, the world's leading car-sharing company, offer accounts allowing drivers to reserve a car whenever they like—without having to worry about maintenance or cleaning, and while saving a lot of money.¹⁵

IV. How Do BATA'S VILLAGE CONNECTORS WORK FOR COMMUTERS?

In order to better describe how fixed routes currently work for some riders-by-choice, we interviewed bus drivers, rode fixed routes, and talked to riders during the summer of 2009. Our goal was to understand how commuters—or any rider-by-choice—were able to make fixed routes fit into their work schedule and lifestyle. In the course of two months, we interviewed six Village Connector drivers, more than 15 bus commuters, and rode more than 1,000 miles on Village Connector routes. This section draws from the interviews, and uses assumed names of real riders:

Deciding to ride the bus

BATA's Village Connector routes are not well advertised. People who cannot drive—the elderly, disabled, carless, or those without driver's licenses—find the bus as a matter of necessity, typically with assistance or referral from human service agencies. But rural residents who are able to drive are very unlikely to even know that a fixed-route bus service exists as a commuting option. How is it, then, that some commuters choose to ditch their car and get on the bus?

Old fashioned word-of-mouth, say most commuters. The necessity of needing an occasional alternative ride to or from Traverse City due to an unscheduled auto repair or an injury that doesn't

¹² Commuter Tax Benefits; Implementing Commuter Benefits as One of the Nation's Best Workplaces for Commuters, Environmental Protection Agency 2005 http://www.bestworkplaces.org/pdf/taxbenes_07.pdf

¹³ University of South Florida, Commuter Tax Benefits Summary Table, http://www.nctr.usf.edu/clearinghouse/commutebenefits.htm

¹⁴ Slug-lines.com, About Slugging, http://slug-lines.com

¹⁵ Zipcar, http://www.zipcar.com; E-go Carshare non-profit, Boulder-Denver Metro Area, http://carshare.org/

allow them to drive can also cause commuters to try the bus. And the bus itself acts as a billboard, promoting some curious riders who watch the bus pass their house every day to hop on. Frank from Glen Arbor watched the Empire Village Connector pass every weekday for months. One day, he decided to call BATA to learn how to use the service. He now rides to work every day.

People who started to use rural fixed route bus service out of necessity sometimes find riding the bus so convenient it becomes a regular transportation choice. Some become regular bus commuters, and some continue to use the bus only as an occasional back-up transportation method.

"The key for a lot of people is learning to use the bus," says Donna, who rides BATA from her home in Cedar to work in Traverse City. "Now I have to remind myself that I have a car and that I can drive. I've gone months at a time without driving." After using public transit to commute and taking the time to learn the route, most transit riders say they're hooked.

How they ride

When public transit systems are designed for demand-response, or Zone Bus riders, little thought goes into how the rider reaches the bus. From doorstep to destination, demand-response riders depend on the bus as they would a taxi cab. But riders can expect demand-response buses to arrive as much as an hour earlier or later than its scheduled time. The length of a passenger's trip depends wholly on the number of people that must be picked up and dropped off along the way. These scheduling irregularities are unacceptable for most commuters.

People riding to work need to arrive on time and maintain control over travel plans. That's why commuters primarily ride fixed routes.

But riding a Village Connector bus presents challenges for most riders: bus stops are relatively far apart and are located in village centers that may be far from a rider's home. So most rural commuters combine bus travel with some other form of transportation. On the BATA Village Connectors, there are many people that combine their bus commute with travel by bicycle, foot, carpooling, or personal vehicle. People who choose to ride the BATA bus make these combinations work for them in various ways.

■ Bikes and Buses

Transit agencies and riders find that bicycling and public transit go together. Biking increases the distance customers can travel to reach fixed transit stops and their final destination after de-busing. BATA has added permanent bike racks to all of its buses.

This allows people like Paula to ride her bicycle three miles from her house in Maple City to the bus stop. When she and her bike arrive at the downtown transfer station, she rides it to her job, which is less than a mile away.

BATA even has free bike storage at its downtown transfer station. So, some bus riders leave a bike in Traverse City. Pat, from Maple City, walks two blocks from his home to the bus stop, rides the bus into Traverse City, and unchains his bicycle stored on the transfer station rack. He then pedals 10 minutes to his job at Munson Medical Center.

Combining buses and bikes makes it easier for commuters to lead an active lifestyle. A 2009 study from the University of British Columbia found that public transit users are three times likelier to meet fitness guidelines. BATA Village Connector riders demonstrate why this is true. For example, Donna from Cedar splits her commute to Traverse City, riding her bicycle one way, and the bus the other.

"I tend to do both almost every day," says Donna. "In the summer, I ride my bike to work in the morning because its cooler. Then I take the bus home. It's nice because it helps me get much-needed exercise. And, I can ride my bike to appointments I have around town."



All Village Connector buses accommodate bicycles. Many riders find it convenient to ride to the bus, load on their bike, and cruise to their destination

■ Walking

While fewer residents in rural northern Michigan are able to walk to work than in metropolitan areas, some people can walk to a bus stop that will take them to work. Many people, when the bus is close enough, walk to the bus and then walk from their stop to work.

Studies have shown that pedestrians' willingness to walk falls dramatically for distances over a half-mile. It stands to reason, then, that those most likely to use existing fixed routes live and work within easy walking distance of a bus stop or along the route where the bus will make a flag stop.

For Laura from Glen Arbor, the choice to use BATA was easy. "It works really well for me," she says. "I pick it up less than half a block from my house. I don't need a car on either end. I think that's a huge factor." People like Laura, who works in downtown Traverse City, find the walk from the BATA transfer station to work easy and convenient. Laura isn't sure she would ride BATA as often if her trip involved longer distances to and from the bus.

■ Carpooling

People who ride the bus regularly say it helps them carpool more. Instead of jumping into the car without a thought, bus riders tend to think about their travel plans farther in advance.

"The hardest thing for people to start riding the bus is to learn how to plan," says BATA's Don Scharmen. For many riders, forming the habit of planning their commute helps them coordinate rides with other people, including neighbors, co-workers, or family members.

Paula, of Maple City, divides her commute to Traverse City between carpooling and riding the bus.

Often, she will take the bus into work and carpool home. Paula says it helps to have a reliable backup; if a shared ride doesn't come through she can always take the bus. Some bus users carpool to a bus stop as well.

■ Driving

Some Village Connector riders who live more than a mile from a the bus route will drive to a bus stop and leave a car there. But limited parking near bus stops makes finding a spot to leave a car difficult.

"It would be really great if there were more park and rides, like a commuter lot," noted Suttons Bay resident Linda. "Sometimes you don't want to park downtown, take up that space."

Still, for riders who live far from a fixed route, driving to catch the bus is often more affordable and saves more car miles than driving to work.

■ Transfers

The first attempt at a multi-county rural fixed route system, the Regional Ride which operated from 1998 to 2000, failed to attract riders, by many accounts because of a lack of regularly scheduled in-town service in Traverse City. Riders could get into the city, but were practically stranded when they arrived.

Now, BATA's rural fixed routes connect to the fixed-route Cherriot system in Traverse City at the downtown transfer station. Village Connector riders are allowed one free transfer, which allows them considerable mobility throughout Traverse City on a timed schedule, with buses arriving every 30 minutes.

"I think it's terrific, the way it connects with the Cherriot," says Mike from Suttons Bay. "I can ride out to Meijer or out to the mall, just about anywhere in Traverse City. They coordinate really nicely."

Some riders, however, wish that the services were even more coordinated. Certain routes may force riders to wait up to 30 minutes for a bus to arrive, a time some are not prepared to wait. And the Cherriot routes still do not connect to many places that riders may want to go.

■ Taxi Service

Commuters who ride the bus to work and find themselves needing a ride to locations not served by the in town Cherriot still have access to private transportation service. Private taxi service is available in the Traverse City area on very short notice with typically less than an hours reservation by phone. While taxis are not as prominent in this region as they are in large metropolitan cities, there are several private services available. Private transportation service is a convenient and practical partner to an effective public transportation system.

■ The One-Car Family

John works for a non-profit agency in Traverse City and lives about one and a half miles from BATA's Empire Village Connector. Because he is able to ride the bus to work every weekday, his family of four is able to function by operating only one car. Because the Village Connector makes stops at his daughter's school, near his home: at the public parks, where his daughters play soccer and softball: and in Glen Arbor, where his wife's parents live: he is able to ride home and connect with his family in numerous places. He also has a system of car-sharing and carpool partners for those days when they need a second car.

Laura, who rides the bus from her home in Glen Arbor to Traverse City, says public transportation has given her the opportunity to give a gift to her daughters: two of the family's cars. "Part of the decision was, you know I've got the BATA anyway so we're not as car dependent as we used to be. That was really a gift of public transportation, to be able to give that to them. We never would have been able to without it." Laura and her husband are now able to own only one car.

■ Frequency of Ridership

Winter roads in northern Michigan can be a nightmare. For many drivers who dread driving on icy roads, fixed route buses offer a break from the stresses of winter driving. Riders can sit back and let someone else do the driving—a huge plus for many white-knuckled winter drivers. Many commuters interviewed for this report said they ride more frequently in the winter to avoid bad driving, and ride less in the summer when daylight hours are at a premium.

Some riders, however, reported that they ride the bus more in the summer. These riders live further from the nearest bus stop, and walk or bike to the bus. Frigid winter temperatures and snowy roads make it harder for them to use a bike reach the bus and to get around once they've reached their destination.

While many riders use the bus for their daily commute, some rely on fixed routes only as an occasional back-up option. Whether their car is in for repairs or being used by a spouse, these riders know they can hop on the bus to get where they need to go.



The addition of a downtown transfer station has brought bus riders closer to the places they work, shop and live.



Laura types away on her laptop, using the BATA Village Connector as a rolling office.

Where they ride

The majority of Village Connector riders surveyed for this report use the bus to travel into Traverse City for work or errands. Most of these commuters are traveling close enough to the transfer center that they can bike or walk to their final destination without transferring to another bus. During summer months there are more "reverse commuters," who ride from Traverse City out to villages, especially in Leelanau County, for seasonal summer jobs.

Some riders use the bus to travel between smaller towns and villages in the region.
Kurt uses the BATA Northport Connector to ride from his home in Northport to work at a surveying firm in Suttons Bay. "I've been riding since 1998 seasonally, continuously since 2003," says Kurt. "It's very convenient."

Why they ride

The average commuter in the Grand Traverse Region travels around 25 miles every day. Auto commuters fill this time by watching the road, listening to the radio, and little else.

Many people are drawn to ride the bus because it frees up the time they otherwise would have lost driving. Dave from Omena uses his bus commute to catch up on leisure reading. In the winter, when the morning darkness reduces the tendency for car-sickness, Laura uses her commute from Glen Arbor to write on her laptop.

"I look forward to the winter," says Laura. "I get a lot of work done on the bus. But sometimes it's just nice to chill out. It's a good way to get the day rolling."

An environmental ethic—reducing our nation's dependence on fossil fue—draws many people public transportation. According to a study by the American Public Transportation Association, an individual can reduce his or her daily carbon emissions by 20 pounds by using public transportation. This adds up to a 10 percent reduction in a household's carbon footprint, 30 percent if one household member gives up that second car to use public transportation.

A greener commute is also a more affordable commute—a transit rider can save an average \$9,167 annually, or about \$764 per month. These calculations are based on the 2009 national average gas price and unreserved parking rate—savings can rise substantially when gas prices are high, but Grand Traverse residents spend less on parking than the national average. However, a typical downtown worker can expect to spend at least \$4/ day on parking. When added to gas costs, a \$6 round trip bus trip is affordable. Many Village Connector riders cite affordability as a big draw for riding the bus.

Commuters are drawn to riding the bus for a variety of reasons, but many continue riding for the social aspect of the bus. A typical bus ride is not a quiet affair. There is a sense of community on the bus as commuters share stories and get to know each other, and there is frequently lively conversation brewing.

"Everybody gets so they know each other after a while, you know, many of the same people ride every day," notes Kathleen, a driver on the Kingsley/Fife Lake route. "It becomes more of a get together thing for some people. We have fun." Commuters usually isolate themselves in their car, but riding the bus offers an easy way to connect with neighbors and build community every day.

V. STRATEGIES FOR EXPANDED RIDERSHIP

Through the Grand Vision process, the public indicated a desire for a regional transit system that provides a viable option for the many thousands of commuters who currently drive across the region for work and errands. As described above, most commuters will only ride a transit system that is fast, reliable, efficient, and runs on a regular schedule with convenient stops.

Based on numerous interviews with the current riders of BATA's fixed-route Village Connectors, as well as the drivers of those routes, several consistent themes emerged for how to improve the system to reach more of this audience. Here are four basic recommendations for creating a regional transit system that better serves the entire community:

1. Focus First on Commuters and Fixed Routes

When considering expanding bus ridership, an important fact is clear: those who have no other choice are already on the bus. Our transit agencies currently do a fine job of serving the disabled, elderly, and people without a driver's license. To attract a broader, new ridership of commuters, transit agencies will need to emphasize fixed routes over demand-response service.

This shift in emphasis should not–and the American Disabilities Act requires that it legally cannot–diminish service to people with disabilities. The ADA requires that transit agencies provide comparable services for people with disabilities to the service provided to people without disabilities. But currently anyone who rides the bus is offered expensive and inefficient demandresponse paratransit service, which does not work well for commuters on a schedule.

By shifting emphasis to fixed routes, transit agencies would only need to provide paratransit service to those who qualify under the ADA. Able-bodied commuters would be able to ride a reliable, convenient fixed-route system.

Most disability advocates would support this shift in emphasis toward a system that serves a broader spectrum of the community. According to Greg Paffhouse, Chief Executive Officer of Northern Lakes Community Mental Health: "It's important to promote a transportation system for the general public, who want reliability. It's a challenge unless you have fixed routes."

2. Promotion and Advertising

While the community of bus riders is strong and growing, it is still quite small. The primary explanation bus riders and drivers give for the low ridership on BATA's Village Connectors is overwhelmingly a lack of promotion. Most of the people riding the bus have learned about the system because they had to seek it out when they had no other transportation option.

But most commuters who currently drive still think of inefficient demand response service when they think of transit. They just don't know about the bus service that is available to them, including BATA's fixed Village Connectors. To get these people to try the Village Connector will first require telling them that there is a reliable, fixed-route service available.

"It's never been advertised," notes Bob, a BATA bus driver. "I've never seen anyone advertising it. We have stops where there's nothing at the stops to let people know it's even there."

A few simple and inexpensive promotional activities could significantly expand ridership on BATA's Village Connceters. Posting signs along the fixed routes to designate bus stops would help greatly, as would locating bus shelters and benches with the BATA logo. In addition, making route maps and schedules prominently available in the businesses near the village bus stops would help raise awareness about the fixed-route service.

"I just think that there should be a way for people to know that we're here," agrees Colleen, another BATA driver. "We have a local paper, and I don't know why we're not in it. We're on the Internet, I guess, but not all of them out here can afford the Internet or have the Internet."

3. Expanded Routes and Hours of Service

The commuters currently using BATA's Village Connectors are often faced with an inconvenient choice: either get to work an hour early (7:30 a.m. arrival), or an hour late (10:15 a.m. arrival). Additional routes that arrived around 9:00 a.m. would make life easier for many commuters.

While some dedicated office commuters have adapted to waking up earlier and having longer work days, a bigger concern for many commuters is that Village Connectors do not accommodate a work schedule that might include nights or weekends. Pam, who rides the Fife Lake Village Connector every day into work in Traverse City and back, has suffered a serious financial setback because of this concern. In order to get to work on Saturdays, Pam must take a taxi that costs her more than she makes in a day's work.

The problem for others is more about having fun. "We need later hours and weekends in the summer especially," says Bill, a BATA driver. "There are events and different kinds of things that probably a lot of people would like to see come in to town."

These issues around expanding hours of operation assume that fixed route service is available. In fact, currently only about nine of the region's villages have BATA's Village Connector service. Areas such as Interlochen, Grawn, Acme, and Elk Rapids do not have access to fixed routes. The Benzie Bus offers a modified fixed route along U.S. 31, although currently it asks riders to call ahead for a reservation. Expanding the number of routes to serve more villages, and coordinating them between county agencies would offer more commuters access to this fixed-route service. Shifting emphasis toward fixed routes and away from paratransit for everyone could be how these agencies offer new services.

4. Rider Comfort and Convenience

The preceding strategies are important to draw more riders to the rural fixed routes. To sustain ridership levels, riding the bus has to be an attractive alternative to driving. Regular commuters have suggested a few amenities that would enhance their transit experience. Conveniences that would make their trip more enjoyable include reading lights, cup holders (although beverages are currently prohibited on the bus), and automated fare cards. Riders hope that in the near future we may see wireless Internet and power outlets on the bus.