

# Public Transit

## Frequently Asked Questions

**Ohio**  
Department of Health



### What is public transit and why is it important?

Public transit is a system of buses, street cars, and/or trains that provide mobility for people living, working, or recreating in a community. Transit plays a major role in communities of all types and sizes, affecting not just transportation but also health, economics, education, employment, civic life, and housing.

Public transit systems typically operate on a schedule along established routes for a posted fee. Rail service (subway, light rail, and street car), considered “fixed guideway” systems, require more planning time and funding to implement and often result in land use changes that strengthen the local economy through denser development. Because of the relatively low set-up cost, communities establish bus systems before considering more costly fixed guideway systems. Bus routes can adapt more easily to ridership or development changes. Bus service can also adapt to needs in rural communities. Bus Rapid Transit (BRT) systems combine the lower cost of bus service with a fixed-guideway-type dedicated travel lane along streets. Communities with both bus and rail transit often coordinate service for people who use both for a single trip. Public transit systems are

### Related Resource: Complete Streets Policies FAQ

required through federal mandate to provide a type of accessible transit service called paratransit<sup>1</sup> for people who are not able to use buses or rail cars.

### Does public transit always have established routes?

Historically public transit has traveled along established routes, usually along streets – this is known as “fixed route” transit. A main driver of fixed-route service planning is efficiency, or its ability to transport the most people at the lowest cost, often focusing on rush hour travel into a community’s primary employment center.

In recent years, and in part because of competition from bikeshare and ride-hailing services, more transit agencies now offer route deviation and demand response service distinct from paratransit service, funded through the federal Mobility on Demand program.<sup>2</sup> These models are valuable in suburban

<sup>1</sup> Federal Transit Administration. (2007). Part 37--Transportation Services for Individuals with Disabilities. Retrieved from: <https://www.transit.dot.gov/regulations-and-guidance/civil-rights-ada/part-37-transportation-services-individuals-disabilities>

<sup>2</sup> Federal Transit Administration. (2019). Mobility on Demand (MOD) Sandbox Program. Retrieved from: <https://www.transit.dot.gov/research-innovation/mobility-demand-mod-sandbox-program>

## Public transit is an attractive option when:

**People can get to the stop or station safely, directly, and reliably.**

People are more likely to use public transit if a stop is within an easy distance from both ends of a trip, when walking or bicycling to a stop is safe, and when the stop layout prioritizes customer comfort and convenience.

**The service provided meets travelers' needs.**

National experience tells us that density and demographics also help determine the type of transit service that will work best in a region. Each type of service is designed to address a community's transit need based on the type of community and riders. Designing the service (hours and days of operation, frequency of service, and vehicle type and capacity), then marketing the public transit service are equally as important.

**The cost of service makes it an affordable option.**

Understanding how investments in public transit benefit both individuals and the larger community is an important part of setting fares. This can allow fares to be affordable for all and motivate people to use transit, increasing its economic and social value.

**Policies and programs support a door-to-door trip.**

Ride-hailing services (such as Uber and Lyft) compete with public transit when it comes to convenience, but transit remains the less expensive option. To remain competitive, agencies offering options that mirror private sector ride-hailing service make their use more attractive. Door-to-door public transit service may also be the most effective option in rural communities with lower population and destination densities, but where the need for transportation remains high.

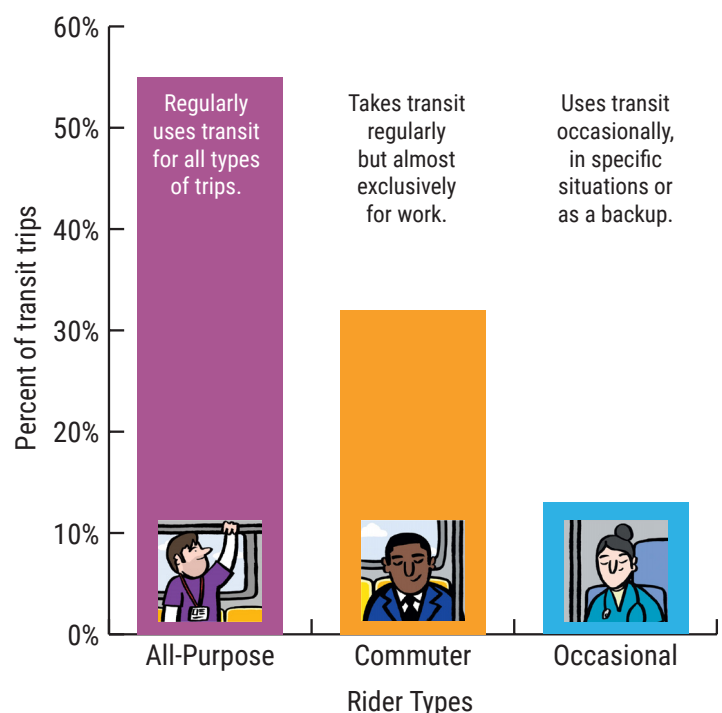
and rural areas that lack robust public transit service. Public transit agencies may also work with human service transportation programs to coordinate medical and social service transportation, using a single call center to schedule trips.

**Fixed Route transit follows established routes and schedules.**

**Demand Response transit alters routes according to passenger needs.**

## Who rides public transit?

People of all ages and abilities use transit: children, teens, adults, and seniors; people with cars, without cars, those who want to save money, and employees using employer subsidies. Transit use depends on factors such as fare prices and service quality, especially compared to other available options. A community's investment in public transit affects the split among three rider types: all purpose, commuters, and occasional. Communities that invest heavily in



There are three general categories of transit riders (Source: Transit Center 2016)



public transit find a lot of different people riding for different purposes, especially where development patterns result in walkable neighborhoods. Communities that disinvest or fail to invest in public transit find that people who take transit are mostly those who seemingly have no other options. However, these “transit-reliant” riders are still sensitive to the quality of service and regularly choose other options such as bicycles and bikeshare, cars owned by family members, taxis, and ride-hailing service.<sup>3</sup>

## What is the impact of transit ridership on public health?

A Centers for Disease Control analysis shows fewer traffic crashes, lower air pollution, increased physical fitness, and other health benefits when people have access to public transit.<sup>4</sup>

### Public transit benefits communities by:

- » Reducing the use of private motor vehicles, which can reduce congestion and improve air quality.
- » Requiring a community to improve its infrastructure for those walking or biking to stops and stations. A good transit access network can reduce crash risks for all and is available to all who walk or bike in the community.
- » Satisfying lifestyle choices for people who prefer not to drive and choose where they live accordingly, helping attract and keep residents.

### Public transit benefits individuals by:

- » Providing mobility for people who do not drive due to age, ability, economics, or choice.
- » Creating opportunities for increased physical activity when people walk or bike to and from a stop or station. For example, an average 19-minute daily walk to a bus stop helps meet the minimum 30 minutes of daily physical activity, regardless

of trip purpose.<sup>5</sup> This, in turn, can result in overall improved physical and mental health.

- » Encouraging social interactions on board and/or at stops, which especially benefits older adults.

## What are the considerations for public transit in rural areas?

Good rural public transit provides local mobility and regional connectivity.<sup>6</sup> A poor public transit system can be a detriment, but a community benefits when public transit offers flexible schedules and routes and coordinates with medical, social service, and senior transport.

Regional bus service offers connections between rural areas and activity centers for jobs, health care, and other quality of life needs. Regional bus service crosses jurisdictional lines, operating between rural regions and connecting to urban areas.

The demand for transit in Ohio’s rural communities may increase as older adults who make up a higher percentage of the total population may have fewer transportation options. While the state’s overall population is expected to increase by 2 percent through 2030, the percent of residents over 65 will increase by 66 percent, with the greatest increases in Ohio’s most rural counties.<sup>7</sup>

## What is the state of public transit in Ohio?

ODOT’s 2015 *Ohio Statewide Transit Needs Study* describes current transit services in Ohio and its benefit to various sectors, such as health, employment, and local economies; and projects financial need through 2030 to meet demand and continue to provide benefits. Some of the study’s findings are summarized below.

3 Transit Center. (2016). *Who’s On Board 2016: What Today’s Riders Teach Us About Transit That Works*. Retrieved from: [http://transitcenter.org/wp-content/uploads/2016/07/Whos-On-Board-2016-7\\_12\\_2016.pdf](http://transitcenter.org/wp-content/uploads/2016/07/Whos-On-Board-2016-7_12_2016.pdf)

4 Centers for Disease Control and Prevention (2018). Public Transportation System: Introduction or Expansion. Retrieved from: <https://www.cdc.gov/policy/hst/hi5/publictransportation/index.html>

5 Besser, L.M. & Dannenberg, A.L. (2005). Walking to Public Transit: Steps to Help Meet Physical Activity Recommendations. *American Journal of Preventative Medicine* 29(4). Retrieved from: [https://www.cdc.gov/healthyplaces/publications/besser\\_dannenberg.pdf](https://www.cdc.gov/healthyplaces/publications/besser_dannenberg.pdf)

6 Shoup, L. & Homa, B. (2010). *Principles for Improving Transportation Options in Rural and Small Town Communities*. Transportation for America. Retrieved from: <http://t4america.org/wp-content/uploads/2010/03/T4-Whitepaper-Rural-and-Small-Town-Communities.pdf>

7 Ohio Department of Transportation (ODOT) (2015). *Statewide Transit Needs Study: Final Report*, 33. Retrieved from: <http://www.dot.state.oh.us/Divisions/Planning/Transit/TransitNeedsStudy/Documents/OhioStatewideTransitNeedsStudyFinalReport.pdf>



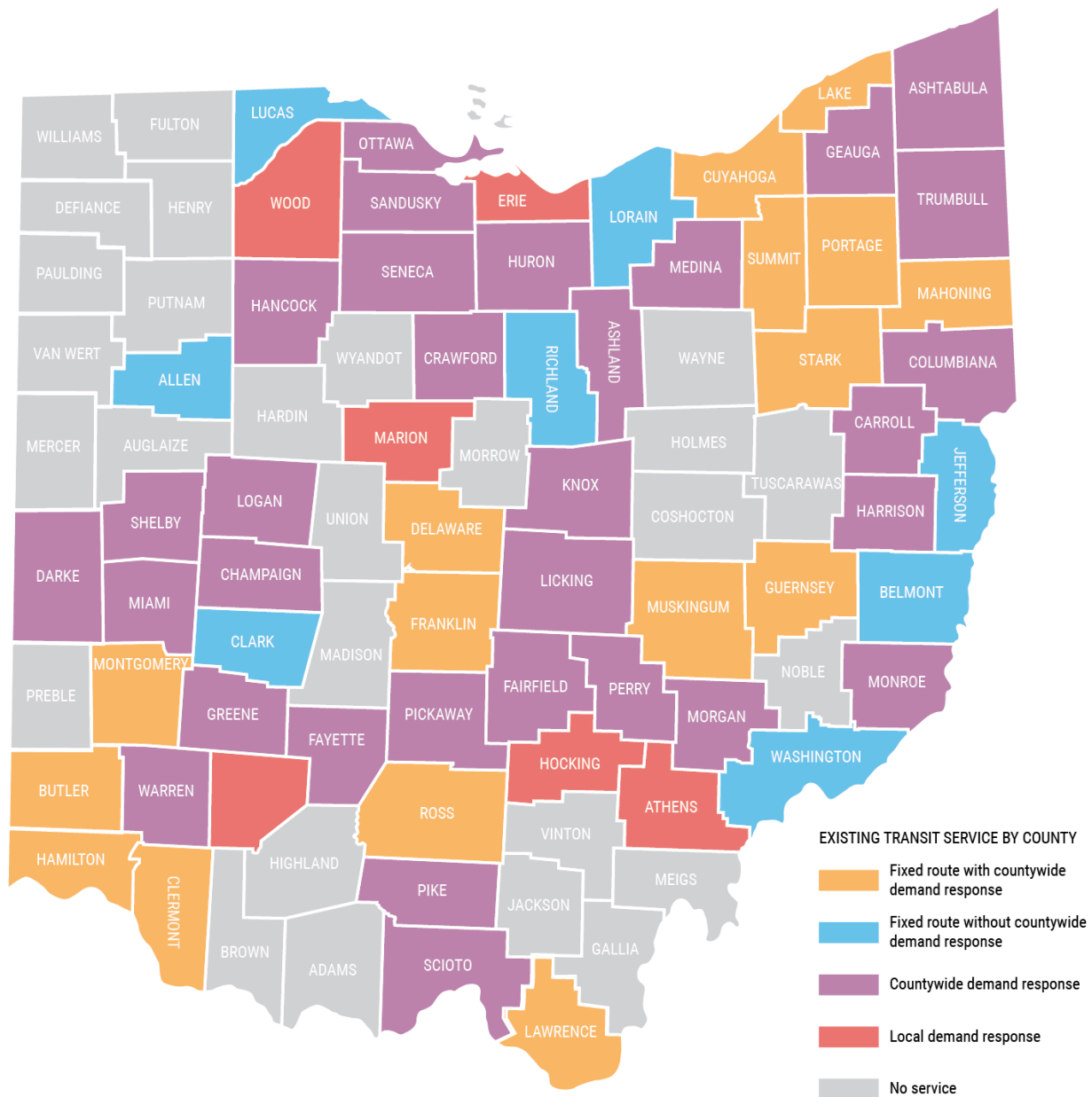


## Communities with transit service

Of Ohio's 61 public transportation providers, 12 provide fixed route services, 31 provide demand response services, and another 18 provide a combination of both. Because of Ohio's development pattern, "nearly every county has at least one town

with enough density to support deviated fixed route service. The remainder of the state has lower densities such that demand response service is likely the most appropriate, though difficulties in providing this base level of service may still exist".<sup>8</sup>

8 ODOT (2015), 22.



Types of transit service in Ohio, by county (Source: Adapted from ODOT 2015.)



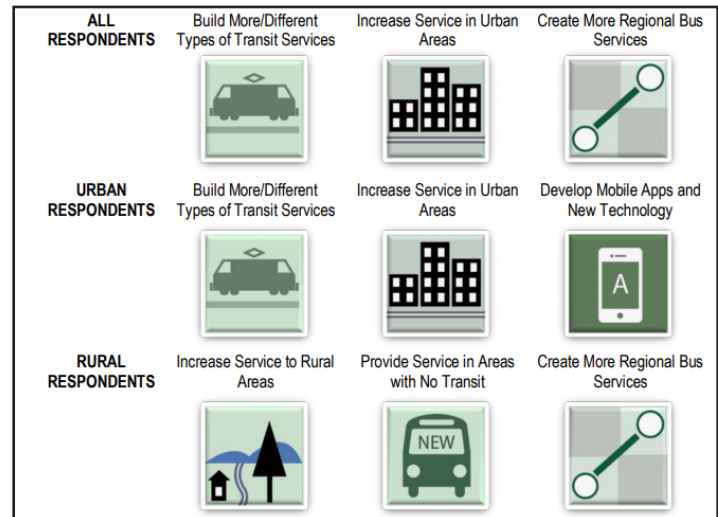
## People with access to transit service

Overall, roughly 80 percent of Ohio residents have access to some sort of public transportation service. Nevertheless, living in a county or city that has public transportation service available does not necessarily indicate a high level of service, quality, or frequency. Approximately 30 percent of Ohio's population has access to demand response service only, meaning people must reserve a trip in advance. Many of these services are available on weekdays during normal business hours only (i.e. 8:00 AM to 5:00 PM). About one-half of Ohio's population lives in communities with fixed route service, but a much smaller portion lives within walking distance to these services -- usually considered to be ¼ mile.

## Build Your Own Transit System

A "Build Your Own Transit System" Survey completed by 2,000 Ohioans resulted in nearly unanimous agreement for new or more service. The image on the right shows the top priorities for urban and rural respondents. While urban respondents identified technology as one of their top three priorities, it was not considered in the top three when looking at all respondents. Other research corroborates that people want good service frequency and shorter travel times before technology improvements.<sup>9</sup>

<sup>9</sup> Transit Center (2016)



Statewide results from the "Build Your Own Transit System Tool" (Source: ODOT 2015)

## What People Value in Transit

- » Most valued: Service frequency and travel time, station and stop conditions, real-time information, and service reliability.
- » Least valued: Power outlets and Wi-Fi

Source: Transit Center (2016).

## Where can I find out more?

### Agencies and Organizations

- » Ohio Department of Transportation, Office of Transit. <http://www.dot.state.oh.us/Divisions/Planning/Transit/Pages/default.aspx> and Mobility Management Program. <http://www.dot.state.oh.us/Divisions/Planning/Transit/Pages/Coordination.aspx>
- » American Public Transportation Association. <https://www.apta.com/>
- » Federal Transit Administration. <https://www.transit.dot.gov/>
- » National Aging and Disability Transportation Center. <https://www.nadtc.org/>
- » Rural Health Information Hub. <https://www.ruralhealthinfo.org/toolkits/transportation/1/needs-in-rural>

### Resources

- » Center for Urban Transportation Research (2009). *Best Practices in Transit Service Planning: Final Report*. University of South Florida. <https://www.nctr.usf.edu/pdf/77720.pdf>
- » National Transport Authority (2016). *Guidance on Bus Stop Locations in Rural Areas*. [https://www.nationaltransport.ie/wp-content/uploads/2016/11/Guidance\\_on\\_Bus\\_Stop\\_Locations\\_in\\_Rural\\_Areas.pdf](https://www.nationaltransport.ie/wp-content/uploads/2016/11/Guidance_on_Bus_Stop_Locations_in_Rural_Areas.pdf)
- » US Department of Transportation (2015). *Rural Public Transportation Systems*. <https://www.transportation.gov/mission/health/Rural-Public-Transportation-Systems>