2015 motion

NASHVILLE MTA/RTA STRATEGIC PLAN

STATE OF THE MTA SYSTEM REPORT

PEER REVIEW

Nashville MTA

RTA

NELSON NYGAARD

GRESHAM SMITH AND PARTNERS

CAMBRIDGE SYSTEMATICS

PEER REVIEW

Over the past two years, the City of Nashville has developed its "preferred future" through NashvilleNext. The project began with a comprehensive outreach program to determine the values and desires of Nashville residents, employees, businesses, and other stakeholders, which were then transformed into the preferred future. That future, which was recently adopted, will better focus development, reduce sprawl, and greatly expand transit service and options. This is the future that those who live, work, and play in Nashville desire.

Concurrently, the Nashville Region Chamber of Commerce and the Nashville Area Metropolitan Planning Organization (MPO) worked to "identify key issues that impact the region's economic well-being and activate community-driven solutions."[6] This effort identified better transit as one of the region's most pressing needs.

While the Nashville MTA has worked continuously to improve and expand transit service, these improvements have not kept pace with the region's growth, and much better transit will be needed to deliver the future that the area desires. This peer review compares the current state of transit in Nashville today with that in other cities to provide an indication of the magnitude of change that will be required to develop great transit for Nashville and Davidson County.

This peer review does this in two ways, by comparing Nashville area with:

1. Current peer cities, or cities that are similar to what Nashville is today. These comparisons provide indications of how MTA's service compares in its current context.
2. "Aspirational" peer cities, or cities that are already like what Nashville is growing to become. These comparisons indicate how transit in Nashville will need to grow to match the growth of the city and county.

CURRENT PEER CITIES

Current peer cities were selected based on a number of considerations that included the peers used in earlier efforts, suggestions from MTA staff, and a review of systems in the National Transit Database (NTD) with similar size and service characteristics. These included:

Transit System Size

- Peak buses
- Annual passenger trips

Service Area Characteristics

- Service area size in square miles
- Service area population
- Service area population density
- Principal city population
- Range of peers

[6] *2014 Nashville Region's Vital Signs Report,* Nashville Region Chamber of Commerce and Nashville Area Metropolitan Planning Organization, 2014.

On this basis, 15 cities and their urban areas were selected as current peers:

- Akron, OH
- Albuquerque, NM
- Cincinnati, OH
- Dayton, OH
- El Paso, TX
- Forth Worth, TX
- Hartford, CT
- Indianapolis, IN
- Jacksonville, FL
- Louisville, KY
- Memphis, TN
- Richmond, VA
- Springfield, MA
- Syracuse, NY
- Tampa, FL

While none of these urban areas are identical to Nashville, they are still similar in many respects. One key difference, however, is that the total population of Nashville MTA's service area is in the middle of the current peer group while its population density is near the bottom (see Table 6). Since transit demand and transit effectiveness is closely linked to density, this means that MTA has a more challenging area to serve than most of its peers.

In terms of similarities, Nashville is most similar to:

- Louisville and Akron in terms of its service area size
- Albuquerque and Dayton in terms of service area population
- Akron and Charlotte in terms of population density
- Louisville and Memphis in terms of principal city population
- Albuquerque and Syracuse in terms of peak buses
- Memphis and Richmond in terms of annual transit ridership

ASPIRATIONAL PEER CITIES

For the aspirational peers, the Nashville Chamber of Commerce and the Nashville Area MPO recently produced the *2014 Nashville Region's Vital Signs Report,* which compared Nashville to current and aspirational peers on a wide range of issues, including transit. For consistency with that report, this peer review uses the same aspirational peers, which are:

Atlanta. Atlanta has a service area population nearly three times that of Nashville MTA and nearly 500 peak vehicles; however, its service area size is similar to Nashville MTA. Atlanta represents the high end of what Nashville could grow to be.

Austin. Austin's service area size is similar to Nashville's. However, its central city has 31% more residents, its service area has 46% more residents, and transit ridership is 3.6 times as high.

Charlotte. Charlotte is another southern city that is growing rapidly and that has a central city that is similar to Nashville with a larger service area population. It has been expanding service rapidly and carries more than twice as many passengers as the Nashville MTA.

Denver. Denver's RTD serves an area with similar population density as Nashville MTA, though the service area population is much greater. RTD is in the midst of intense investment in a variety of premium transit modes including rail and BRT, which can be illustrative for Nashville MTA as it invests in premium transit.

Kansas City. Kansas City's KCATA has a service area with only about 20% more residents than Nashville MTA, but KCATA provides 72% more annual passenger trips. Kansas City is currently constructing its first streetcar line and its third BRT line and is working toward the development of a stronger regional system.

Raleigh. Similar to Nashville's MTA, Raleigh's CAT serves a capital city, though one that is much more densely developed. While CAT's service area population is roughly half that of MTA's, it is effective in serving over 6 million annual passenger trips. MTA can look to this smaller peer agency as it considers the influence of density on transit effectiveness.

TABLE 6 CHARACTERISTICS OF NASHVILLE AND SELECTED PEER CITIES

	Transit Provider	Principal City Population	Service Area Population	Service Area Size (Sq. Mi.)	Service Area Population Density	Peak Buses	Annual Passenger Trips
Nashville	**Metropolitan Transit Authority**	**601,222**	**626,681**	**484**	**1,295**	**128**	**9,273,784**
Current Peers							
Akron	METRO Regional Transit Authority	199,110	542,899	420	1,293	103	5,140,419
Albuquerque	City of Albuquerque Transit Department	545,852	661,629	235	2,815	128	12,821,051
Cincinnati	Southwest Ohio Regional Transit Authority	296,943	845,303	262	3,226	289	17,390,349
Dayton	Greater Dayton Regional Transit Authority	141,527	559,062	274	2,040	87	7,358,398
El Paso	City of El Paso Mass Transit Department	649,121	803,086	251	3,200	122	16,390,603
Fort Worth	Fort Worth Transportation Authority	741,206	824,984	350	2,357	126	7,439,290
Hartford	CT Transit	124,775	851,535	664	1,282	196	14,698,648
Indianapolis	Indianapolis and Marion County Public Transportation	820,445	911,296	396	2,301	123	9,981,918
Jacksonville	Jacksonville Transportation Authority	821,784	874,673	277	3,158	138	11,500,899
Louisville	Transit Authority of River City	597,337	972,546	477	2,039	181	20,320,506
Memphis	Memphis Area Transit Authority	646,889	732,710	311	2,356	123	8,404,564
Richmond	Greater Richmond Transit Company	204,214	449,572	227	1,980	135	9,352,988
Springfield	Pioneer Valley Transit Authority	153,060	551,543	302	1,826	133	11,171,748
Syracuse	Central New York Regional Transportation Authority	145,170	467,025	248	1,883	128	10,226,862
Tampa	Hillsborough Area Regional Transit Authority	335,709	822,404	243	3,384	153	14,314,610
Peer Average		428,209	724,684	329	2,343	144	11,767,524
Peer Median		335,709	803,086	277	2,301	128	11,171,748
Aspirational Peers							
Atlanta	*Metropolitan Atlanta Rapid Transit Authority*	*420,003*	*1,574,600*	*498*	*3,162*	*443*	*61,596,700*
Austin	*Capital Metropolitan Transportation Authority*	*790,390*	*915,694*	*522*	*1,754*	*481*	*33,548,378*
Charlotte	*Charlotte Area Transit System*	*731,424*	*758,927*	*445*	*1,705*	*258*	*22,870,411*
Denver	*Regional Transportation District*	*600,158*	*2,619,000*	*2326*	*1,126*	*822*	*76,716,999*
Kansas City	*Kansas City Area Transportation Authority*	*459,787*	*748,415*	*332*	*2,254*	*195*	*15,988,034*
Raleigh	*Capital Area Transit*	*403,892*	*347,729*	*125*	*2,782*	*65*	*6,441,622*
Peer Average		567,609	1,160,728	708	2,131	377	36,193,691
Peer Median		529,973	837,311	472	2,004	351	28,209,395

Source: National Transit Database RY 2011 Service Area Size, Service Area Population; NTD RY 2012 Vehicles Operating at Maximum Service (Motorbus only), Annual Unlinked Passenger Trips; US Census 2010.

PEER REVIEW MEASURES

Eleven different measures were examined that address transit ridership levels, the amount of transit service provided, productivity, cost efficiency, subsidies and funding, and resource allocation:

Transit Ridership

- **Total Annual Transit Ridership:** Total ridership on all modes, which is an indication of a combination of the size of the transit system and the size of the area served.
- **Transit Ridership per Capita:** The extent to which the service area population utilizes transit services on all modes.

Amount of Transit Service

- **Vehicle Revenue Hours per Capita:** The quantity of service on all transit modes provided to the people living in the service area.

Service Productivity

- **Passenger Trips per Bus Hour:** Total ridership divided by the number of service hours provided, quantifying utilization of the provided fixed route bus service.

Cost Efficiency

- **Total Operating Cost per Bus Hour:** How much it costs to provide an hour of bus service.
- **Total Operating Cost per Bus Passenger:** How much it costs the transit agency to provide bus service per passenger.

Subsidy

- **Bus Farebox Recovery:** The share of operating costs that are covered by fare revenues for the bus mode. The higher the fare recovery rate, the lower the net cost of service (or subsidy) required.
- **Net Operating Cost per Bus Passenger:** How much it costs the transit agency to provide bus service to each bus passenger, after subtracting the fare revenue. This is the cost that must be paid for each passenger trip by other funding sources, such as local, state, and federal sources.

Resource Allocation

- **Operating Expenditures by Mode:** How much it costs to operate the different modes offered, including bus, rail, and demand response service. This information is useful to see the range of modes offered in each peer system and the relative share of expenditures associated with each.

Funding

- **Operating Funds by Source:** How much funding on a relative basis comes from fare revenues and local, state, federal, and other sources.
- **Total Operating Funding per Capita:** The amount of operating funding for transit operation per year per service area resident for the transit system.

Note that some of the above measures are presented for the entire transit system while others focus specifically on bus service. Measures that relate to the service provision and funding are for the system as a whole and, in large part, reflect the level of importance placed on transit service. Other measures, such as costs per passenger and unit of service, are for bus service only; as some of the peer systems provide significant amounts of rail service, the inclusion of those services could skew overall totals. Since all of the peer systems provide bus service, the use of bus-only figures provides a better comparison.

TRANSIT RIDERSHIP

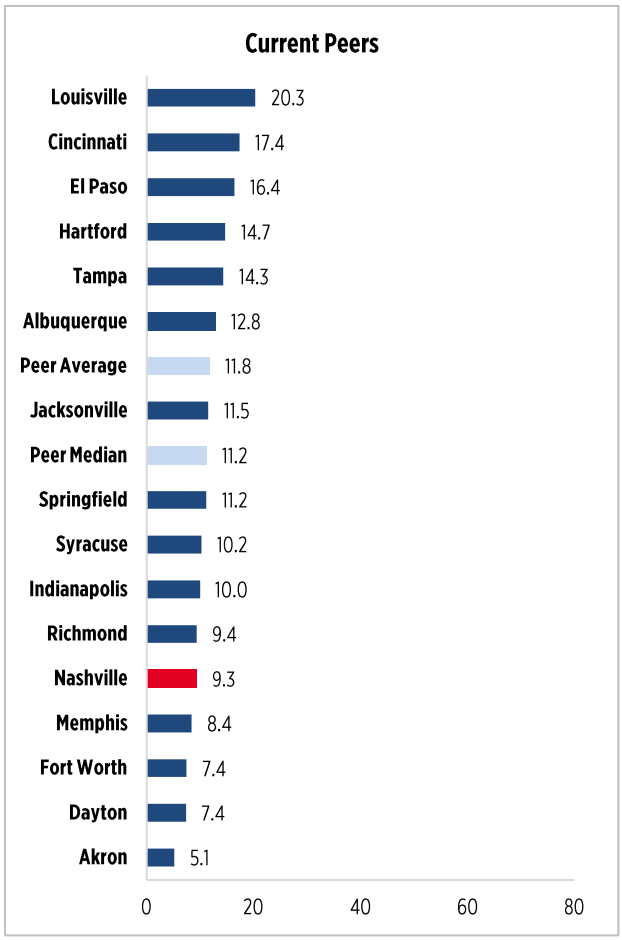
TOTAL RIDERSHIP

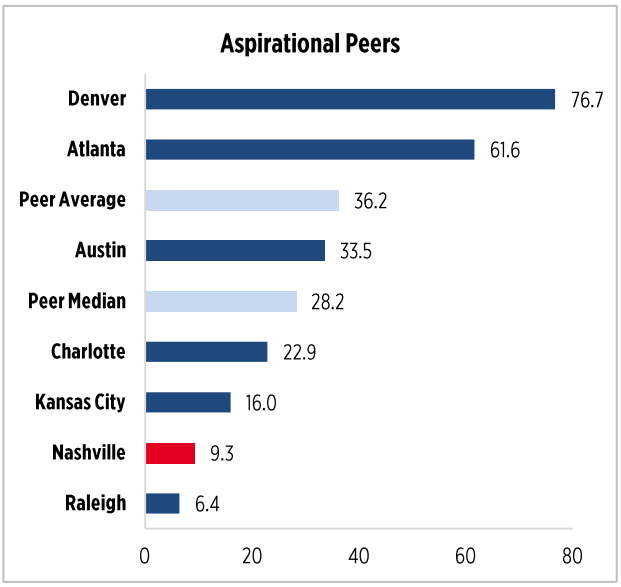
One of the most common measures of effectiveness for transit systems is total ridership, and in 2012, Nashville MTA carried 9.3 million riders.

KEY TAKEAWAY: *Total transit ridership in Nashville is low. This is true compared to current peer cities, and even more so compared to the aspirational peer cities.*

- Among current peers, Nashville's ridership ranks 12th out of 16. It is also well below the levels achieved by the top ranking cities, with Louisville at 20.3 million passengers, Cincinnati at 17.4, and El Paso at 16.4.
- Compared to the aspirational peers, the differences are even larger. Denver, which has been expanding and improving transit service very aggressively, carried 76.7 million passengers in 2012, even higher than Atlanta's 61.6 million. The only aspirational peer that had lower transit ridership was Raleigh, at 6.4 million passengers.

FIGURE 43 TOTAL ANNUAL RIDERSHIP





Source: National Transit Database FY 2012. Systemwide Unlinked Passenger Trips

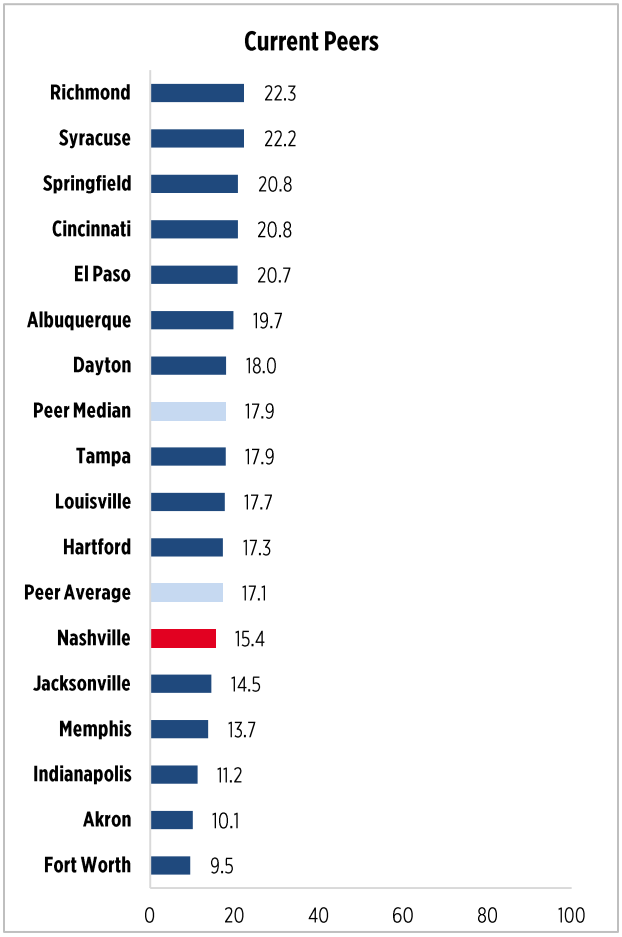
RIDERSHIP PER CAPITA

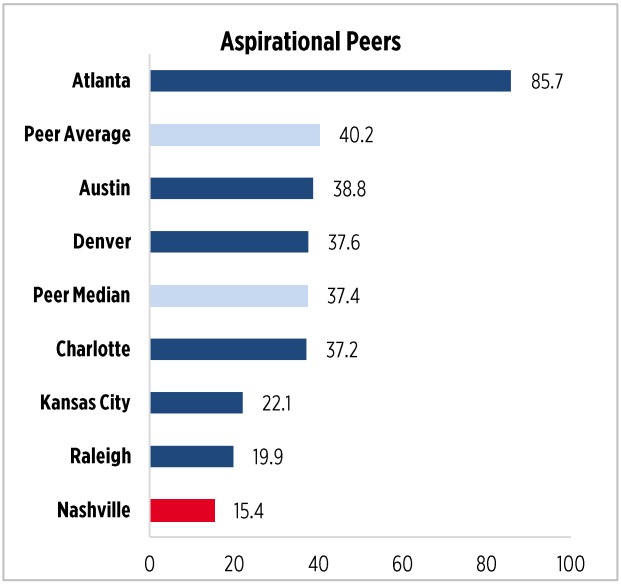
In most cases, higher total ridership in one area versus another is due to market size. When service area sizes are considered, Nashville's ridership is still low compared to both its current and aspirational peers:

KEY TAKEAWAY: *Even after accounting for difference in city size, Nashville's transit ridership is still low compared to other areas.*

- Nashville area residents make 15.4 trips per capita, which ranks 12th out of 16 and is 14% below the peer median of 17.9 trips per capita.
- Among aspirational peers, ridership per capita is significantly higher in all areas, with a range of 19.9 in Raleigh to 85.7 in Atlanta. Discounting Atlanta, which is an outlier, the aspirational peers carry 29% to 161% more passengers than MTA.

FIGURE 44 PASSENGER TRIPS PER CAPITA





Source: National Transit Database FY 2012. Systemwide Unlinked Passenger Trips per Service Area Population.

AMOUNT OF TRANSIT SERVICE PROVIDED

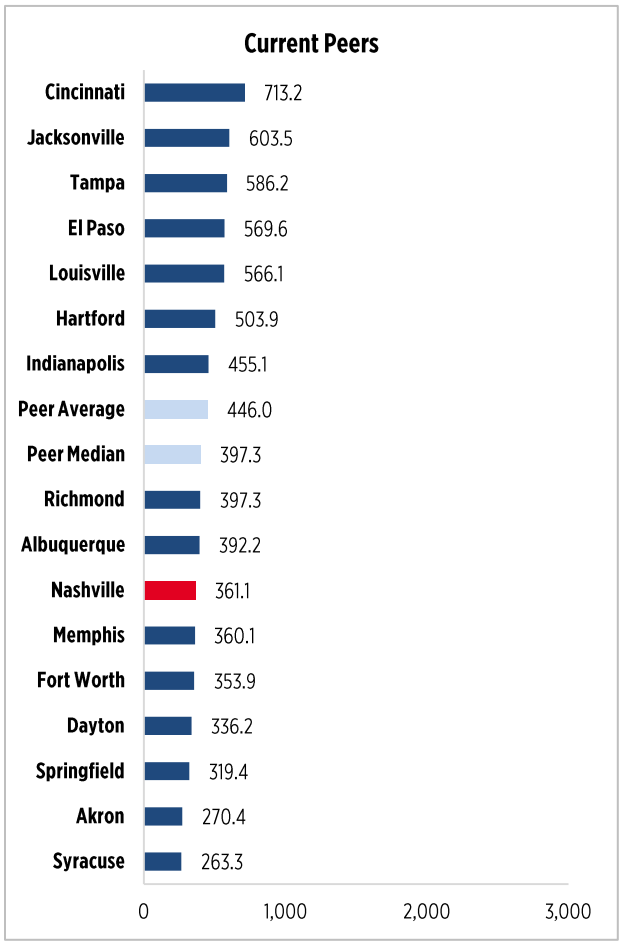
TOTAL ANNUAL SERVICE HOURS (ALL MODES)

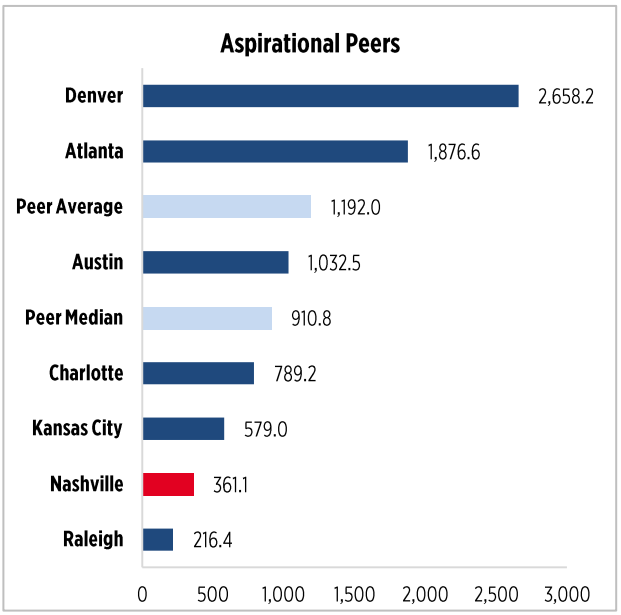
One major reason that transit ridership is lower in the Nashville area is that less service is provided:

KEY TAKEAWAY: *Much of the reason that Nashville's ridership is lower is because less service is available.*

- Nashville's current peers provide between 263,300 annual hours of service (Syracuse) and 713,200 hours (Cincinnati). Nashville MTA provides 361,100 hours, which ranks 10th overall, and is 9% below the peer median.
- Compared to the aspirational peers, Nashville MTA provides much less service than all but Raleigh (which is also the only aspirational peer to carry fewer total riders than Nashville). The aspirational peer that provides the most service is Denver, with over six times as much service as Nashville; as discussed previously, Denver has been aggressively improving its transit service. Kansas City, which provides the second lowest amount of service among the peers, provides 60% more service than MTA.

FIGURE 45 ANNUAL VEHICLE SERVICE HOURS (THOUSANDS)





Source: National Transit Database RY 2012 Systemwide Vehicle Revenue Hours per Service Area Population.

ANNUAL SERVICE HOURS PER CAPITA (ALL MODES)

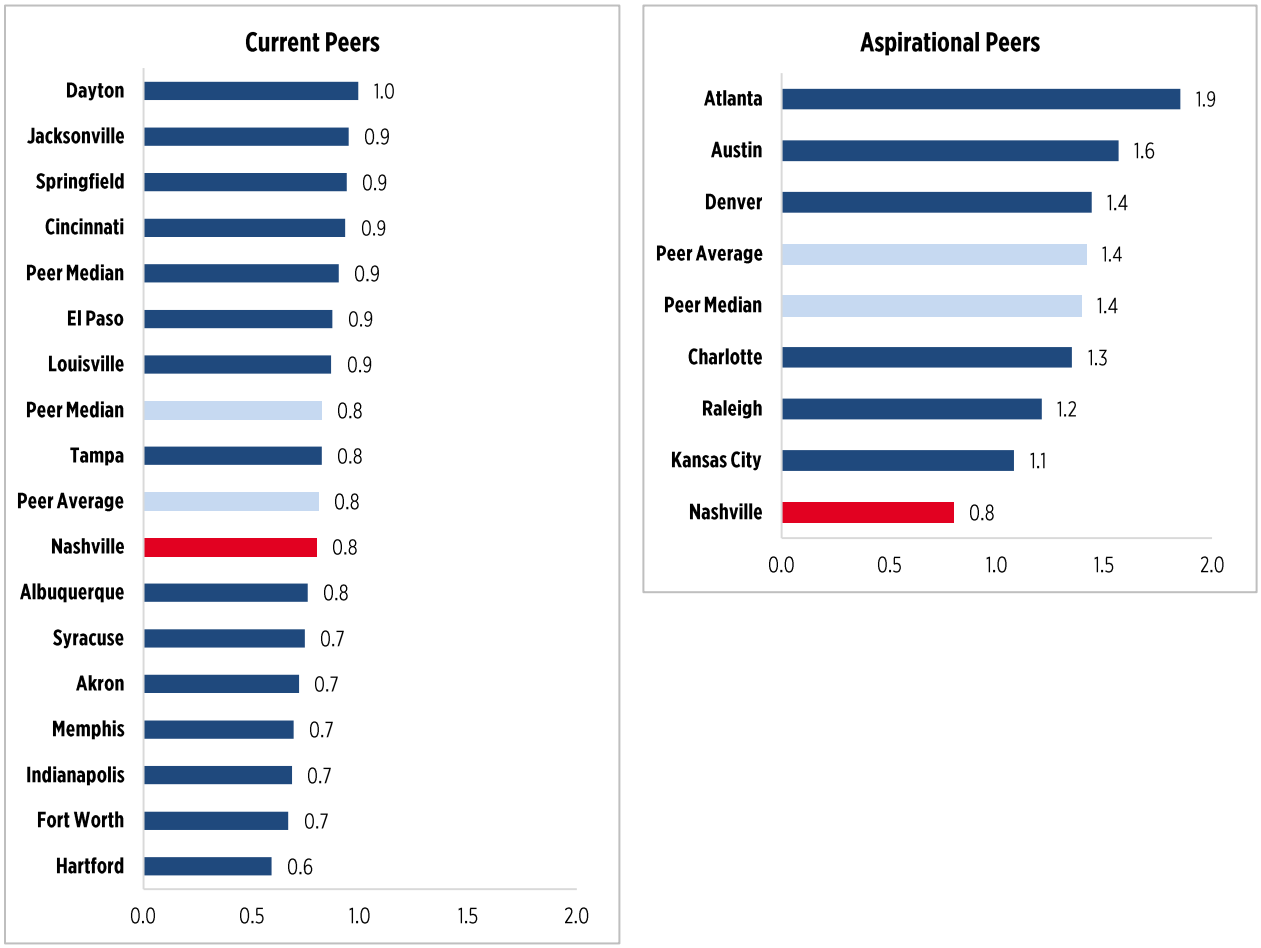
The amount of service that transit systems provide is related to market size. When the amount of service that the peer systems provide is considered relative to their respective populations, Nashville MTA still lags, but to a lesser extent.

KEY TAKEAWAY: *Even after accounting for city size, Nashville provides less service.*

- Among the current peer group, the amount of service provided falls in a relatively narrow range of 0.7 to 1.0 annual hours of service per resident. Nashville MTA provides 0.8 hours, which is equivalent to the current peer average and median of 0.8 hours.
- However, when compared to the aspirational peers, Nashville falls to the bottom of the list. Kansas City, which provides the least amount of service at 1.1 hours of service per resident, still provides 38% more than Nashville. Atlanta, which provides the most service per capita, provides 138% more service; Austin, which is second, provides 88% more.

These figures indicate that, while the amount of service that Nashville provides is average compared to its current peers, it provides significantly less service per capita than all of its aspirational peers.

FIGURE 46 ANNUAL VEHICLE SERVICE HOURS PER CAPITA



Source: National Transit Database RY 2012. Systemwide Vehicle Revenue Hours per Service Area Population.

SERVICE PRODUCTIVITY

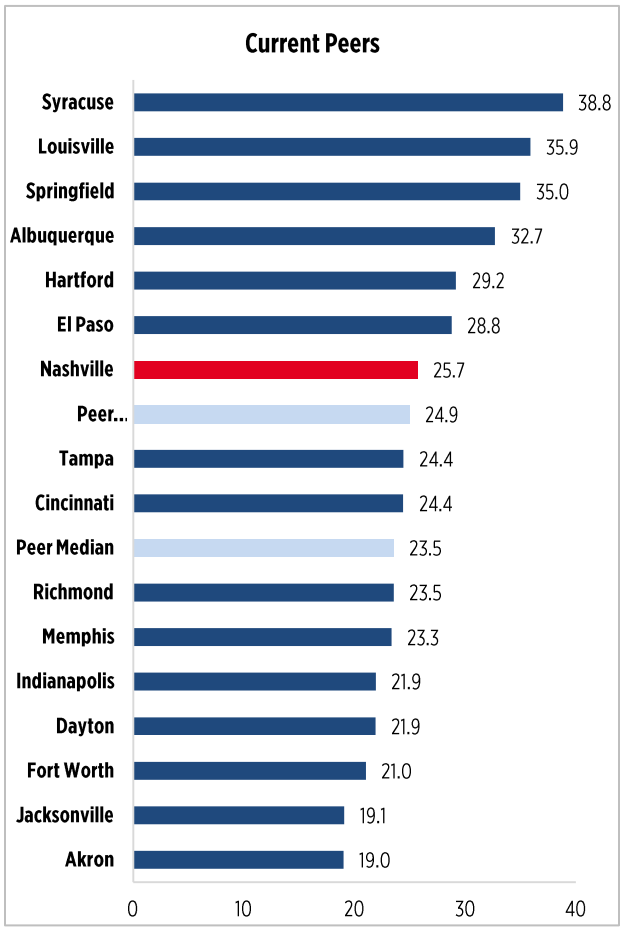
PASSENGERS PER BUS SERVICE HOUR

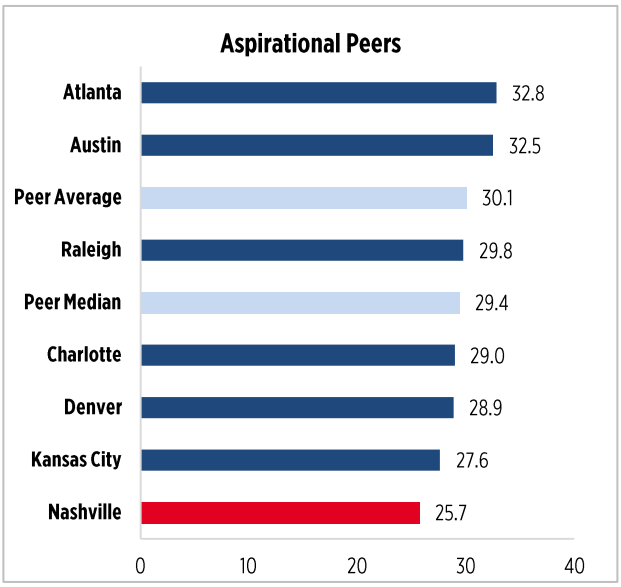
The number of passenger trips that are carried per bus service hour provides a measure of productivity in terms of how well existing service is utilized and, in many respects, how well it is designed. This measure is also influenced by market characteristics, and as described previously, the Nashville area has a more challenging market to serve due to sprawl.

KEY TAKEAWAY: *The service that MTA provides is productive, but could still be more productive.*

- In spite of this, compared to its current peers, Nashville MTA performs above average and above the median, carrying 25.7 passengers per vehicle service hour.
- Productivity is lower than all of the aspirational peers. However, this is to be expected because as urban areas grow, they typically become more densely developed; with more people in close proximity to transit, both ridership and productivity increase. This is not always the case, and the top performing current peers have higher productivity than the many of the aspirational peers.

FIGURE 47 PASSENGER TRIPS PER BUS SERVICE HOUR





Source: National Transit Database RY 2012. Bus Unlinked Passenger Trips per Bus Vehicle Revenue Hour.

COST EFFICIENCY

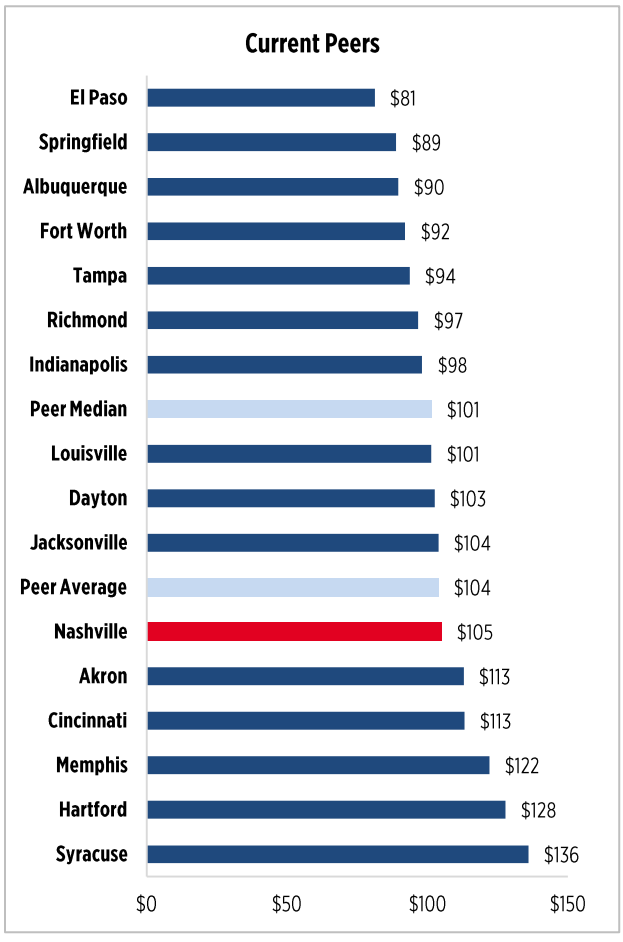
OPERATING COST PER BUS SERVICE HOUR

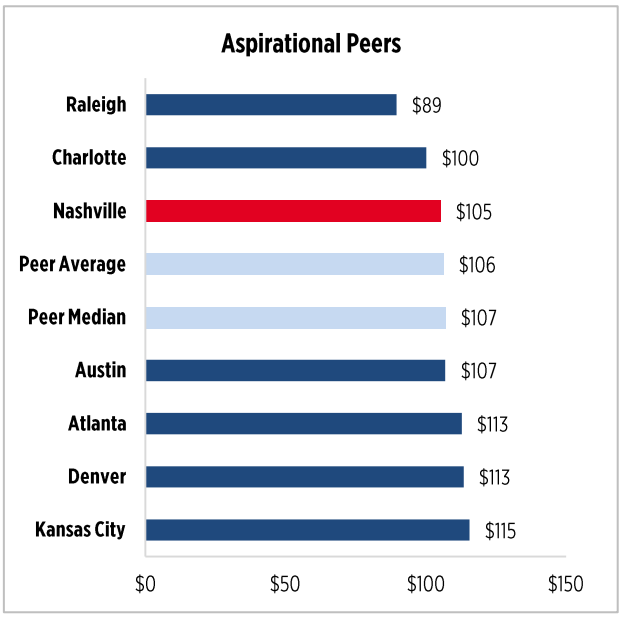
Nashville MTA's operating cost per bus service hour of $105 is slightly below the average costs of its current peers and is at the low end of its aspirational peers:

- For the current peers, the costs range from a low of $81 in El Paso to a high of $136 in Syracuse.
- For the aspirational peers, the range is from $89 to $115.

These costs are heavily influenced by local labor costs, which tend to be higher in northern cities and in larger cities. In general, the highest costs per revenue vehicle hour are in the northeastern cities, and the lower costs are in southern and Sunbelt cities including El Paso, Albuquerque, Fort Worth, Tampa, and Raleigh. Another factor is the use of contractors to provide service. Several of the low cost systems purchase bus service from contractors, including Springfield, Fort Worth, Indianapolis, and Louisville.

FIGURE 48 TOTAL OPERATING COST PER BUS SERVICE HOUR





Source: National Transit Database RY 2012. Bus Total Operating Expenses per Bus Vehicle Revenue Hour.

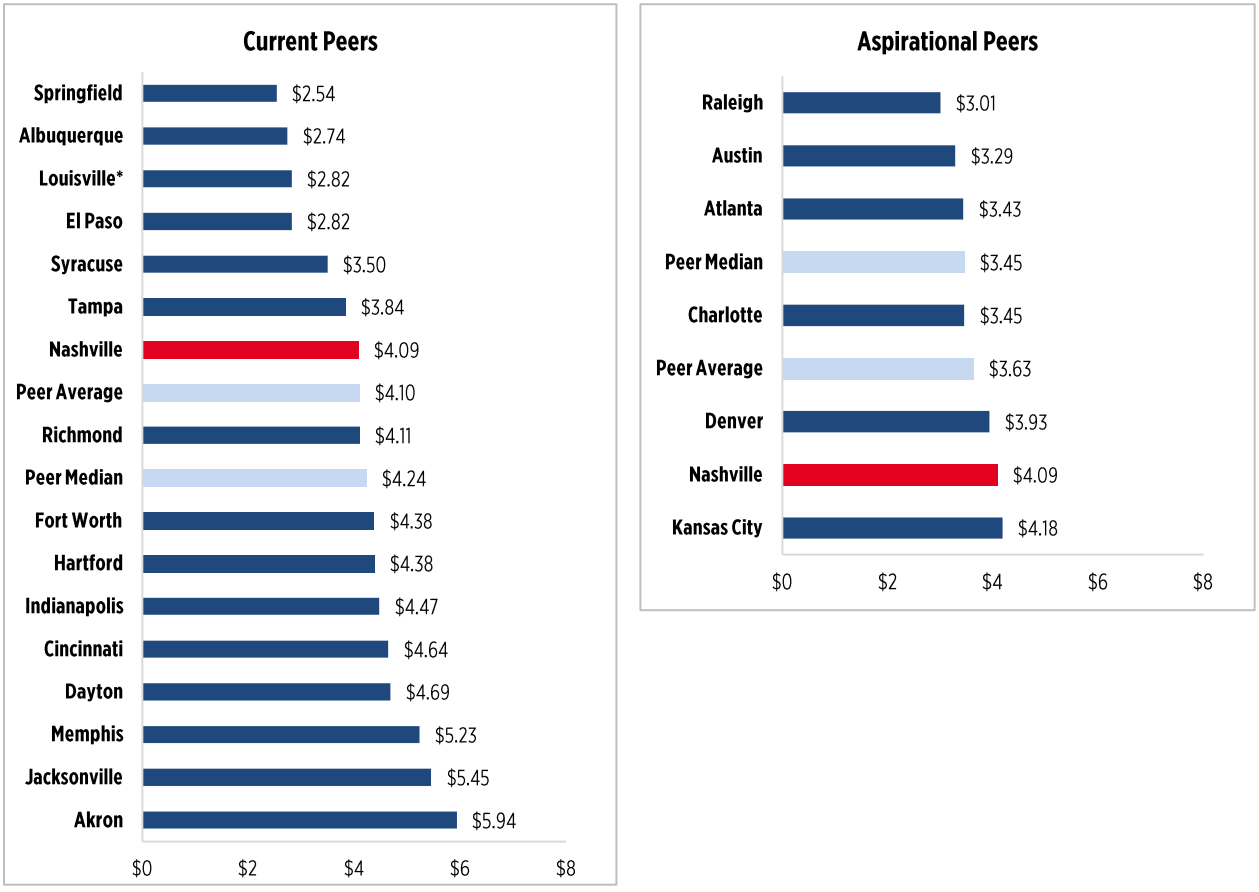
OPERATING COST PER BUS PASSENGER

Nashville MTA's current operating cost per bus passenger is $4.09 (see Figure 49):

KEY TAKEAWAY: *As MTA grows its cost per passenger will likely decline.*

- Among current peers, this is better than both the peer median and peer average, and the figure reflects that Nashville MTA's slightly higher than average productivity offsets its slightly higher than average operating cost per bus service hour. Consequently, MTA delivers slightly lower costs per passengers than most of its current peers. However, it is significantly higher than some of its peers—for example, El Paso, Louisville, and Albuquerque—with the major reason that those systems carry both more passengers per vehicle hour and have lower cost structures.
- When compared to its aspirational peers, Nashville's costs are the second highest, after Kansas City. For the most part, this is because larger systems carry more passengers per vehicle, to the extent that their higher productivity more than offsets their generally higher cost structures. As the Nashville area and Nashville MTA grows, it is likely that its operating cost per bus passenger will decline.

FIGURE 49 OPERATING COST PER BUS PASSENGER



Source: National Transit Database RY 2012. Bus Total Operating Expenses per Bus Unlinked Passenger Trip.

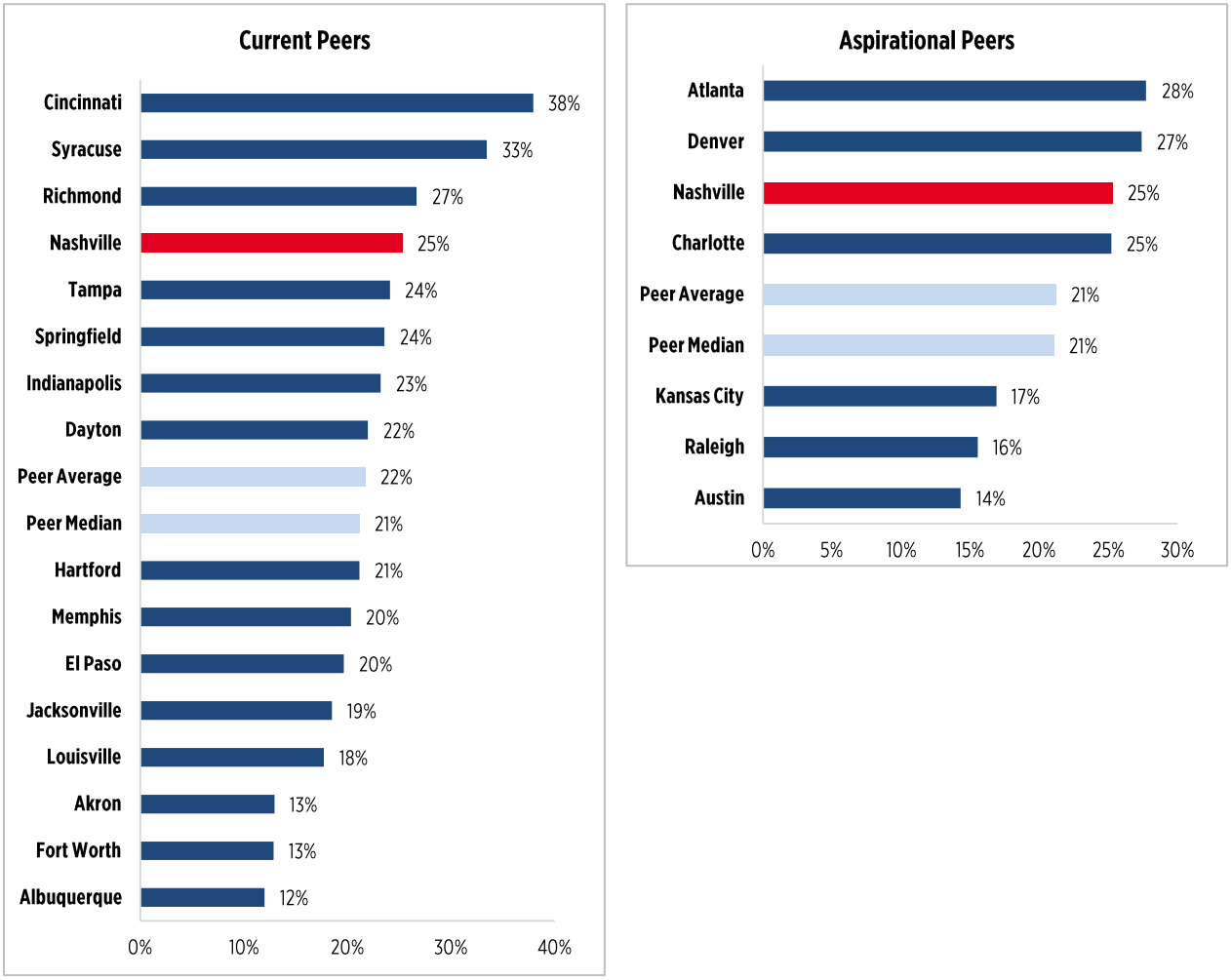
BUS FAREBOX RECOVERY RATE

As is the case with transit systems in all developed countries, fare revenue covers only a small proportion of operating costs. Nashville MTA covers 24% of its bus operating cost through fares.

KEY TAKEAWAY: *MTA's farebox recovery rate is better than most of its current and aspirational peers.*

- Among its current peers, this is fourth best, and within a range of 12% (Albuquerque) to 38% (Cincinnati).
- It is also very good—and third best—among aspirational peers, where farebox return ranges from 14% (Austin) to 28% (Atlanta).

FIGURE 50 FARE RECOVERY RATE (BUS ONLY)



Source: National Transit Database RY 2012. Bus Fare Revenues Earned per Bus Total Operating Expenses.

Farebox return is related to a number of factors, which include (1) the transit system's overall cost structure, (2) productivity levels, and (3) fare levels. As described previously, Nashville MTA's cost structure is slightly higher than average, but so is its productivity. Its adult cash fare ($1.70) ranks at the median (aspirational peers) or just below it (current peers) (see Table 7). This implies that Nashville MTA would rank similarly with respect to bus farebox return to its rank in terms of operating cost per passenger. However, many passengers pay discounted fares (for example, monthly pass riders, seniors, and individuals with disabilities), and Nashville MTA's better than average performance implies that its discount levels may be lower than many of the peer systems.

TABLE 7 REGULAR ADULT CASH FARE

Current Peers

City	Fare
Albuquerque	$1.00
Akron	$1.25
Springfield	$1.25
El Paso	$1.50
Hartford	$1.50
Jacksonville	$1.50
Richmond	$1.50
Nashville	**$1.70**
Cincinnati	$1.75
Dayton	$1.75
Fort Worth	$1.75
Indianapolis	$1.75
Louisville	$1.75
Memphis	$1.75
Syracuse	$2.00
Tampa	$2.00

Aspirational Peers

City	Fare
Austin	$1.00
Raleigh	$1.25
Kansas City	$1.50
Nashville	**$1.70**
Charlotte	$2.00
Denver	$2.25
Atlanta	$2.50

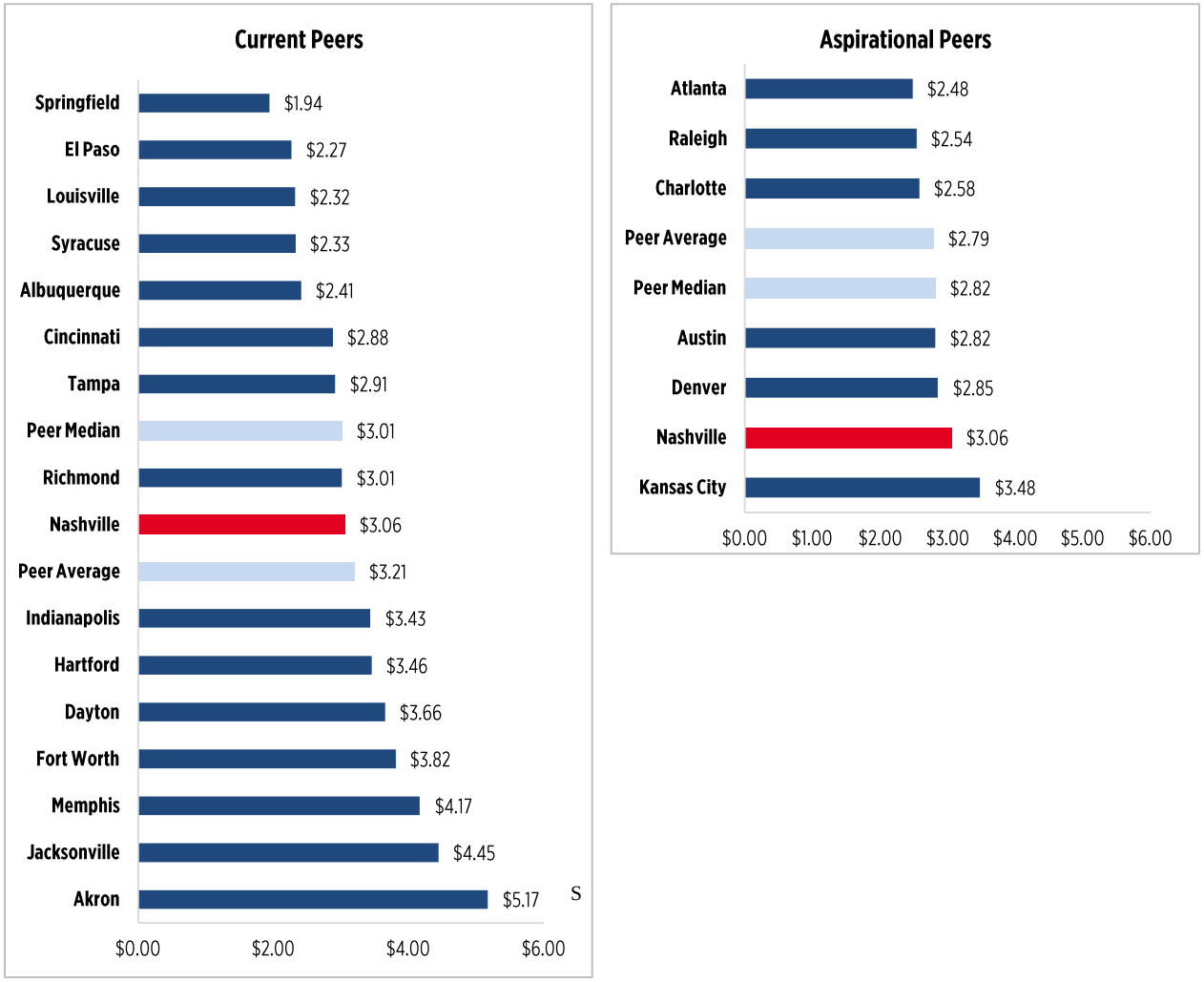
NET OPERATING COST PER BUS PASSENGER

After accounting for fare revenue, Nashville MTA's net operating cost per bus passenger is $3.06 (see Figure 51):

- This is slightly below average for its current peers.
- However, it is higher than both the median and the average for the aspirational peers. This is largely because as ridership grows, net costs per passenger decrease.

KEY TAKEAWAY: *MTA's net operating cost per passenger will also likely decline as the system grows.*

FIGURE 51 NET OPERATING COST PER BUS PASSENGER



Source: National Transit Database RY 2012.Net Bus Operating Expenses (Total Expenses less Fare Revenue) per Bus Unlinked Passenger Trip.

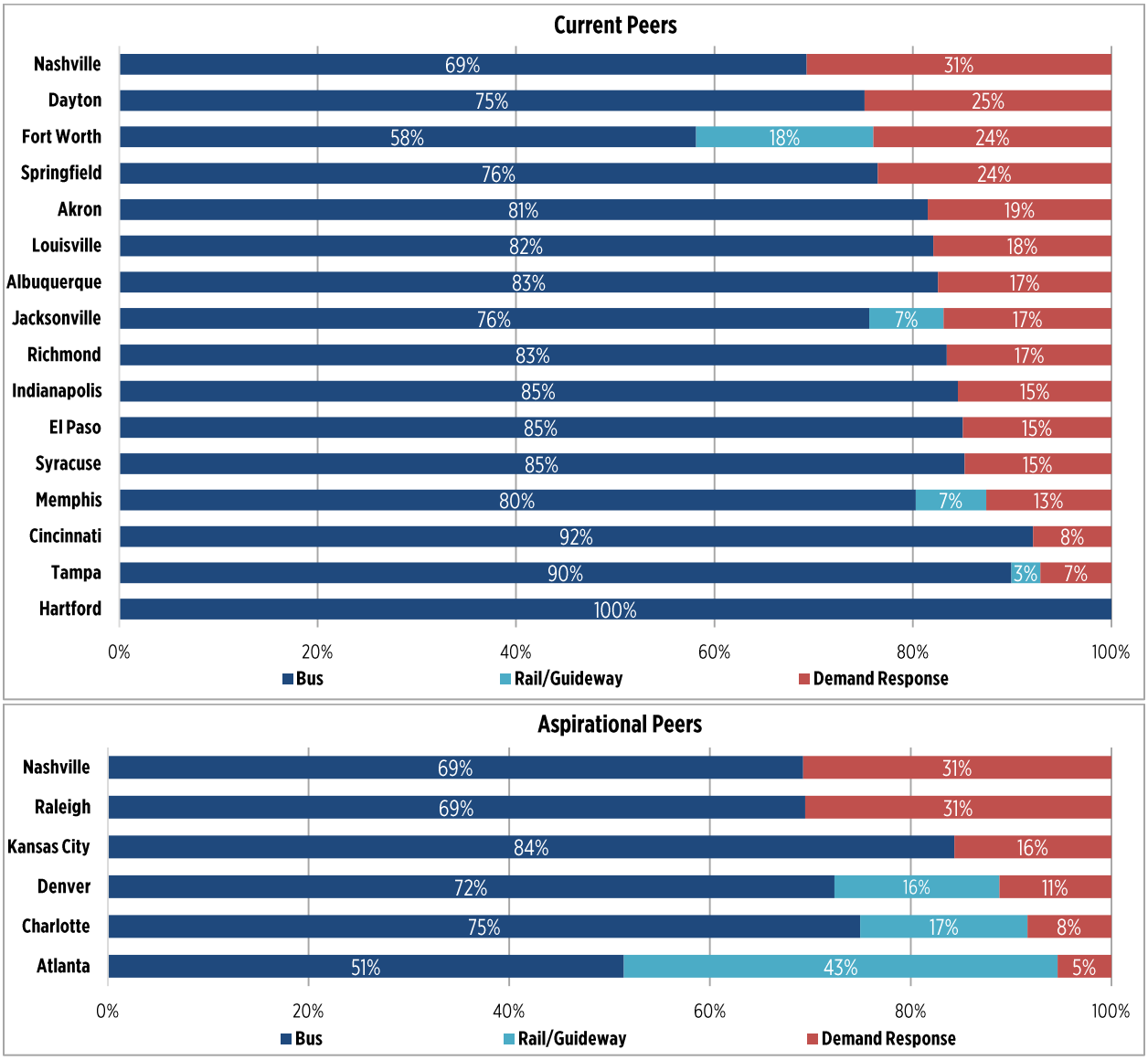
RESOURCE ALLOCATION

OPERATING EXPENDITURES BY MODE

Nashville MTA spends proportionally less on general public service (bus only or bus and rail) and more on paratransit service than its peers. This is the case in comparison to both its current and aspirational peers—Nashville MTA spends 31% of its operating budget on paratransit service, while most other agencies spend less than 20% (see Figure 52).

KEY TAKEAWAY: *Spends proportionally less on service for the general public and more on transportation for those with special needs.*

FIGURE 52 OPERATING COSTS BY MODE



Source: National Transit Database RY 2012. Total Operating Expenses by Mode.

MTA's high level of expenditures on paratransit is due to the fact that MTA provides more expansive service than most other agencies. Federal law requires that transit systems provide complementary paratransit within three-quarters of a mile of fixed-route service during the times those services operate. Nashville MTA, in contrast, provides paratransit to all residents of Davidson County whether they are within three-quarters of a mile of fixed route service or not. Paratransit service is also provided for longer hours than fixed-route services in many cases. While MTA's AccessRide program clearly provides important benefits to many residents, it also comes at a cost to service to the general public. Looking forward, to better balance expenditures between general public and paratransit service, it may be desirable to allocate future service increases more heavily toward general public transit.

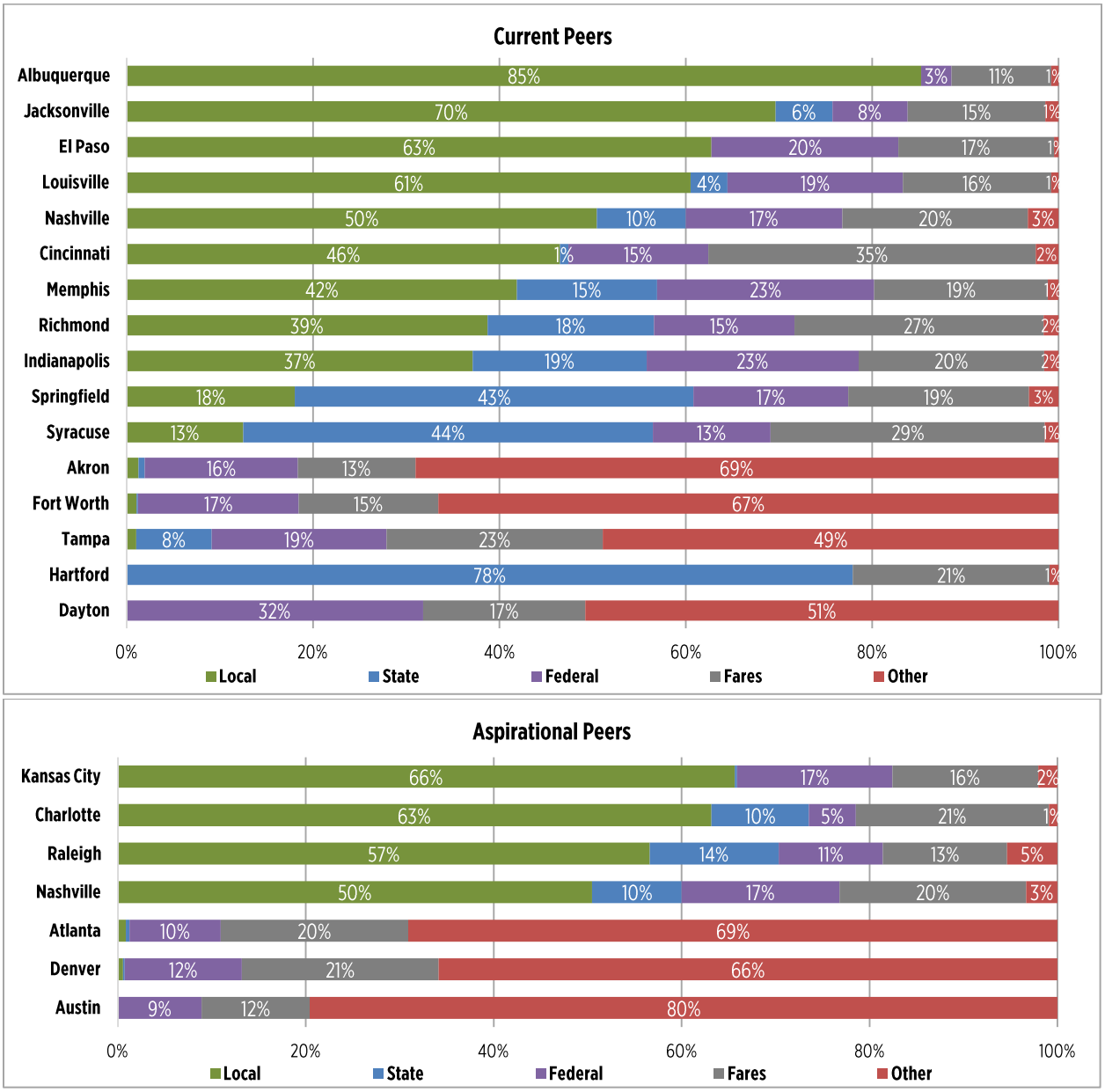
FUNDING

OPERATING FUNDS BY SOURCE

Most transit systems rely heavily on local funding, either provided directly by the communities that they serve or via local or regional sources such as sales taxes (indicated as "Other" in Figure 53). Nashville MTA receives 50% of its funding from local sources, primarily from the city of Nashville.

KEY TAKEAWAY: *As MTA grows, more local funding will be needed.*

FIGURE 53 OPERATING FUNDS BY SOURCE



Source: National Transit Database RY 2012. Operating Funds Applied from Local Sources per Service Area.

- Compared to its current peers, MTA's funding falls within a range of 85% for Albuquerque to 13% for Syracuse. Current peers that do not receive "local" funding receive 49% to 69% from "Other" funding, which is usually a local sales tax. Cities that do not receive large amounts of local or other funding—for example, Springfield, Syracuse, and Hartford—typically receive most of their funding from the state, and the availability of state funding usually means that relatively low amounts of local or other funding are available.
- Of the aspirational peers, all receive the largest proportion of their funding from either local or other funds. None receive a large proportion from the state.

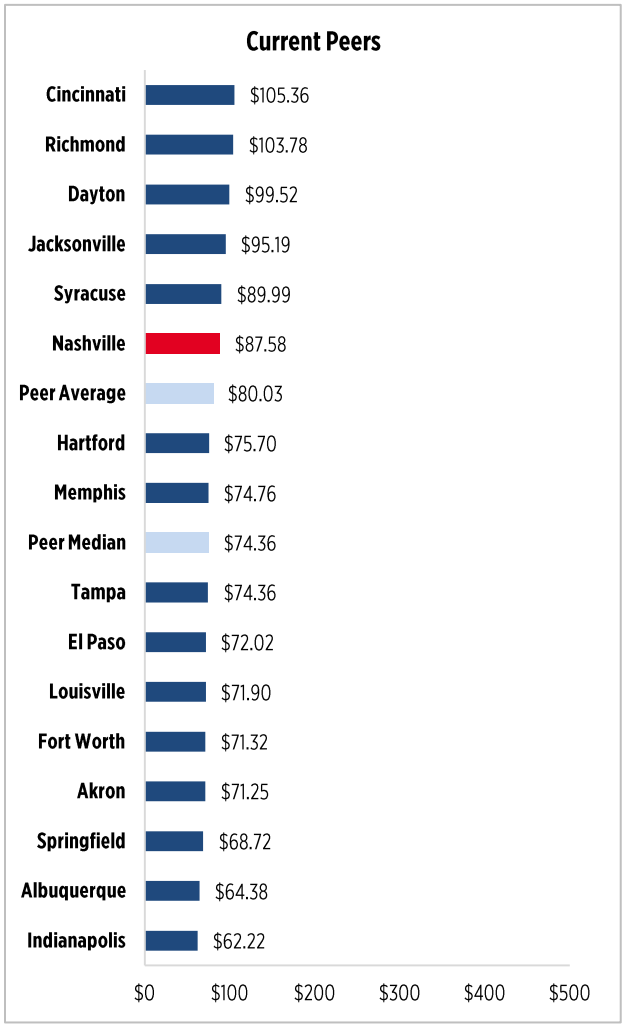
OPERATING FUNDING PER CAPITA

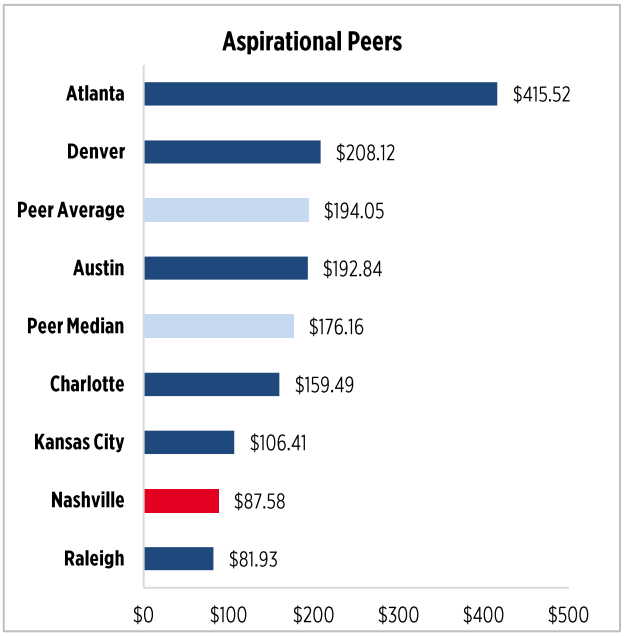
From all sources, Nashville MTA receives $88 in operating funding per capita per year, compared to an average of $80 among its current peers and a median of $74 (see Figure 54). This figure is within an overall range from $105 for Cincinnati to $62 for Indianapolis. These figures indicate that MTA is reasonably well funded compared to its current peers.

KEY TAKEAWAY: *To develop a great transit system, significantly more local funding will be needed.*

Compared to its aspirational peers, however, MTA ranks very low. Five of the aspirational peers receive much higher levels of funding, ranging from a high of $416 for Atlanta to $106 for Kansas City. The aspirational peer group average is $194 and the median is $176. Only Raleigh, which receives $82 per capita, receives less than Nashville MTA. These figures indicate that funding for Nashville MTA will need to significantly increase if MTA is to begin providing services more similar to the aspirational peer cities.

FIGURE 54 OPERATING FUNDING PER CAPITA





Source: National Transit Database RY 2012. Operating Funds per Service Area Population.

SUMMARY OF FINDINGS

As stated in the recent *2014 Nashville Region's Vital Signs Report,*[7]

> "**If we don't do something about transportation, we're all in trouble.** Our ability to move around in the region is deteriorating and will continue to do so unless we take action. A history of sprawling development has made commuting to work vulnerable to traffic congestion and rising fuel prices, and a lack of dedicated funding to expand and modernize our regional transit system threatens the future prosperity of the region as a whole. Declining mobility doesn't just inconvenience us; it is a barrier to economic development and has a significant impact on our quality of life."

This peer review confirms that transit investment in the Nashville area is lower than in most current peer cities. Consequently, transit ridership is also lower. Even more importantly, Nashville is growing rapidly and is becoming a larger city that will have significantly greater transit needs. In comparison to cities that are already like what Nashville is growing to become, transit investment lags even more significantly.

KEY TAKEAWAY: *Transit service and funding in Davidson County will need to be significantly increased for the city and region to become what it wants to be.*

NASHVILLE COMPARED TO CURRENT PEERS

Compared to its current peers, the performance of Nashville MTA service is slightly below average (see Table 8). Among the 16 transit systems in the current peer areas, Nashville MTA ranks:

- 12th in terms of total transit ridership
- 11th in terms of transit ridership per capita
- 10th in terms of the total amount of service provided
- 9th in terms of the amount of service provided per capita

Its productivity and cost efficiency, however, ranks very close to average among the current peers:

- 7th in terms of passengers per bus service hour
- 11th in terms of total operating cost per bus service hour
- 7th in terms of operating cost per passenger
- 4th in terms of farebox recovery ratio
- 9th in terms of net operating cost per passenger

One area where Nashville MTA is an outlier from its current peers is its balance between general public and paratransit service, where it spends 69% of its operating budget on general public service and 31% on paratransit service. This compares to an average split of 79%/21% for the peer group as a whole.

Finally, the amount of local and regional funding that Nashville MTA receives is close to average, and among the current peer group, Nashville MTA ranks:

- 8th in terms of the proportion of total operating funding
- 6th in terms of local and regional funding per capita

[7] Nashville Area Chamber of Commerce and Nashville Area MPO, 2014.

TABLE 8 SUMMARY OF NASHVILLE RANK FOR PERFORMANCE MEASURES

Performance Measure	Peer Range	Peer Average	Peer Median	Nashville	Nashville Rank
Current Peers					
Transit Ridership					
Total Transit Ridership (millions)	5.1 – 20.3	11.8	11.2	9.3	12 of 16
Ridership per Capita	9.5 – 22.3	17.9	17.1	15.4	11 of 16
Service Provided					
Total Annual Vehicle Hours (000s)	263 – 713	446	397	361	10 of 16
Annual Vehicle Hours per Capita	0.6 – 1.0	0.8	0.8	0.8	9 of 16
Productivity					
Passengers per Vehicle Hour	19.4 – 38.8	24.9	23.5	25.7	7 of 16
Cost Efficiency					
Operating Cost per Vehicle Hour	$81 - $136	$104	$101	$105	11 of 16
Operating Cost per Passenger	$2.54 - $5.94	$4.10	$4.38	$4.08	7 of 16
Subsidy					
Bus Farebox Recovery Rate	12% - 38%	22%	21%	25%	4 of 16
Net Operating Cost per Passenger	$1.94 - $5.17	$3.21	$3.01	$3.06	9 of 16
Expenditure by Mode					
General Public	69% - 100%	79%	83%	69%	16 of 16
Paratransit	0% - 31%	21%	17%	31%	1 of 16
Funding					
% Local/Regional Funding	0% - 85%	47%	51%	50%	8 of 16
Operating Funding per Capita	$62 - $105	$80	$74	$88	6 of 16
Aspirational Peers					
Transit Ridership					
Total Transit Ridership (millions)	6.4 – 76.7	36.2	28.2	9.3	6 of 7
Ridership per Capita	19.9 – 85.7	40.2	37.4	15.4	7 of 7
Service Provided					
Total Annual Vehicle Hours (000s)	216 – 2,658	1,192	911	361	6 of 7
Annual Vehicle Hours per Capita	1.1 – 1.9	1.4	1.4	0.8	7 of 7
Productivity					
Passengers per Bus Service Hour	27.6 – 32.8	30.1	29.4	25.7	7 of 7
Cost Efficiency					
Operating Cost per Vehicle Hour	$89 - $115	$105	$110	$105	3 of 7
Operating Cost per Passenger	$3.01 - $4.18	$3.46	$3.45	$4.09	5 of 7
Subsidy					
Bus Farebox Recovery Rate	14% - 28%	21%	21%	25%	3 of 7
Net Operating Cost per Passenger	$2.48 - $3.48	$2.79	$2.82	$3.06	5 of 7
Expenditure by Mode					
For General Public	69% - 95%	86%	89%	69%	6 of 6
Paratransit	5% - 31%	14%	11%	31%	1 of 6
Funding					
% Local/Regional Funding	57% - 80%	67%	69%	50%	7 of 7
Operating Funding per Capita	$82 - $416	$194	$176	$88	6 of 7

NASHVILLE COMPARED TO ASPIRATIONAL PEERS

Compared to the aspirational peers, Nashville MTA falls behind in most respects. This indicates that as part of the process of the Nashville area's growth, transit service will need to be expanded significantly. Compared to the six aspirational peers in terms of ridership and the amount of service provided, Nashville MTA ranks:

- 6th in terms of total ridership, with only Raleigh carrying fewer total riders, and with total ridership only 33% of the peer median
- 7th in terms of ridership per capita, and at only 41% of the peer median
- 6th in term of the total amount of service provided (again, ahead of only Raleigh), and at 40% of the peer median
- 7th in terms of the amount of service provided per capita, and at 57% of the peer median

In terms of passengers per bus service hour, Nashville MTA ranks 7th, but still close to the peer median (at 87% of the median). Nashville MTA's cost effectiveness compares favorably, however:

- 3rd in terms of total operating cost per bus service hour, and 5% better than the peer median
- 5th in terms of operating cost per passenger, and 19% higher than the peer median
- 3rd in terms of farebox recovery ratio, and 19% better than the peer median
- 5th in terms of net operating cost per passenger, and 19% higher than the peer median

As is the case compared to its current peers, Nashville MTA also spends proportionally less than its aspirational peers on general public transit service and more on paratransit service, with a split of 69%/31% versus the aspirational peer median of 89%/11%.

Finally, the amount of local and regional funding that Nashville MTA receives is significantly less than for the aspirational peers:

- 7th in terms of the proportion of total operating funding, and 28% below the peer median
- 6th in terms of local and regional funding per capita (once again, above only Raleigh), and 50% below the peer median