

Passenger rail services play different roles in moving people around a region. Each type of service has unique operating characteristics, station needs, and travel markets. Understanding these differences is important when considering how a future intercity passenger rail station along I-4 in Polk County could fit into the larger Central Florida transportation network.

This overview compares four types of passenger rail services in Florida and uses the Miami metro area as an example of how they can work together to create a connected rail transportation network within a metropolitan area.



LIGHT RAIL



HEAVY RAIL



COMMUTER RAIL



INTERCITY RAIL

MIAMI: A Connected Passenger Rail Network

Miami’s rail network shows how different services can meet different travel needs within one connected system. Local services like Metrorail and Metromover link destinations in downtown Miami, Tri-Rail provides regional commuter travel, and Amtrak and Brightline connect travelers to other cities across Florida and the U.S. Together, these services create a seamless network connecting neighborhoods, jobs, airports, and major destinations. Stations support easy transfers, walkable access, clear passenger information, and connections to buses and other transportation options.



Source: Miami-Dade County

COMPARISON OF PASSENGER RAIL SERVICES



LIGHT RAIL

Streetcar or Trolley



HEAVY RAIL

Subway, Metro or Rapid Transit



COMMUTER RAIL

Regional or Suburban Rail



INTERCITY RAIL

Amtrak, Brightline, or High Speed Rail

Local Circulation in Urban Areas

Frequent short-distance service within urban areas.

High-Capacity Urban Travel

Moves large numbers of passengers through dense urban corridors.

Peak-Hour Commuting

Daily travel between home, work, school, and other major destinations.

City-to-City Connection

Long-distance travel between cities and regions at higher speeds.



Operates on tracks in travel lane or on dedicated guideways

Operates on dedicated tracks with no road crossings

Operates on dedicated tracks, often shared with freight rail

Operates on dedicated tracks, often shared with freight rail unless higher speed



High-Frequency Service
5-15 mins, all day

High-Frequency Service
2-10 mins, all day

Frequent or Hourly Service
15-60 mins

Hourly or Daily Service
Brightline: 60 mins
Amtrak: 1 departure per day



Closely spaced stops
Streetcar: 0.25 mile;
Light Rail: 0.5-2 miles

Closely Spaced Stops
0.5-2 miles

Moderately Spaced Stops
2-10 miles

Widely Spaced Stops
10-50+ miles



Slower speeds
Streetcar: 8-12 mph
Light Rail: 20-25 mph

Moderate speeds
Average: 18 mph

Moderate speeds
Avg speed: 30 mph

Higher speeds
Brightline: 70 mph (125 mph max)
Amtrak: 40 mph (80 mph max)



Shorter Distance Trips
Streetcar: 1-5 miles
Light Rail: 5-30 miles

Short to Medium Distance Trips
5-30 miles

Medium Distance Trips
20-60 miles

Long Distance Trips
30-150+ miles



Shorter Electric Train
1-3 cars; powered by overhead or catenary/contact wire)

Longer Electric Train
4-10 cars; powered by electrified third rail

Longer Trains with Multiple Cars
Diesel or electric locomotive with 3-12 passenger cars

Longer Trains with Multiple Cars
Diesel-electric or electric locomotive with 4-12+ passenger cars



Limited Amenities
Basic seating and onboard features

Some Amenities
Limited seating, standing room space, and some onboard features

Better Amenities
Multiple seating options and restrooms

Premium Amenities
Comfortable seating, luggage storage, restrooms, and dining options

Note: Averages for all characteristics; * Total capacity for passengers including all cars or coaches on a train.

Sources: American Public Transportation Association, Federal Transit Administration, Federal Railroad Administration, Amtrak, Brightline, SunRail